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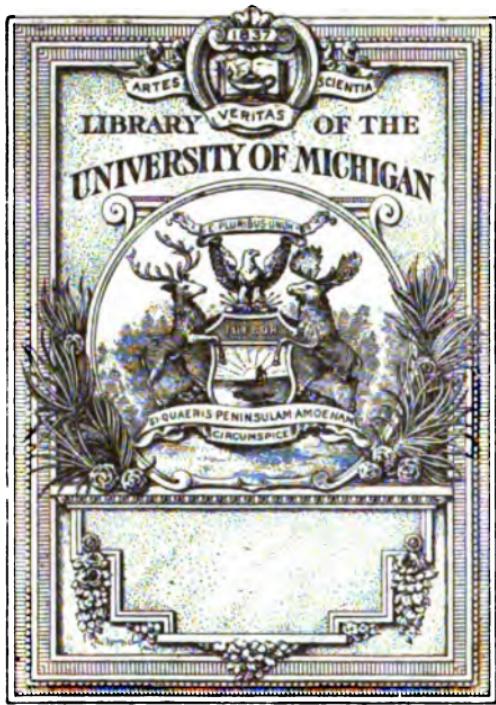
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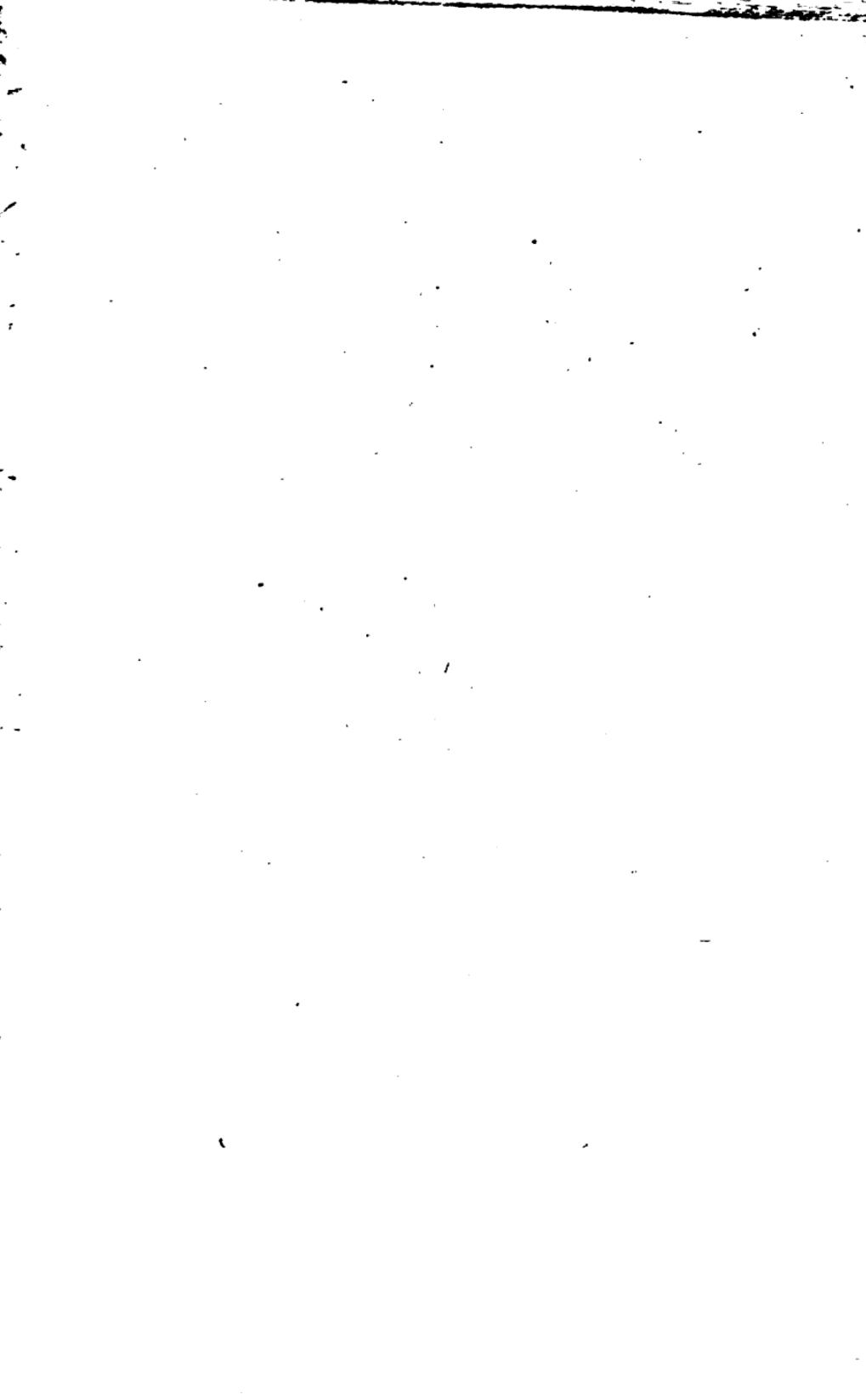
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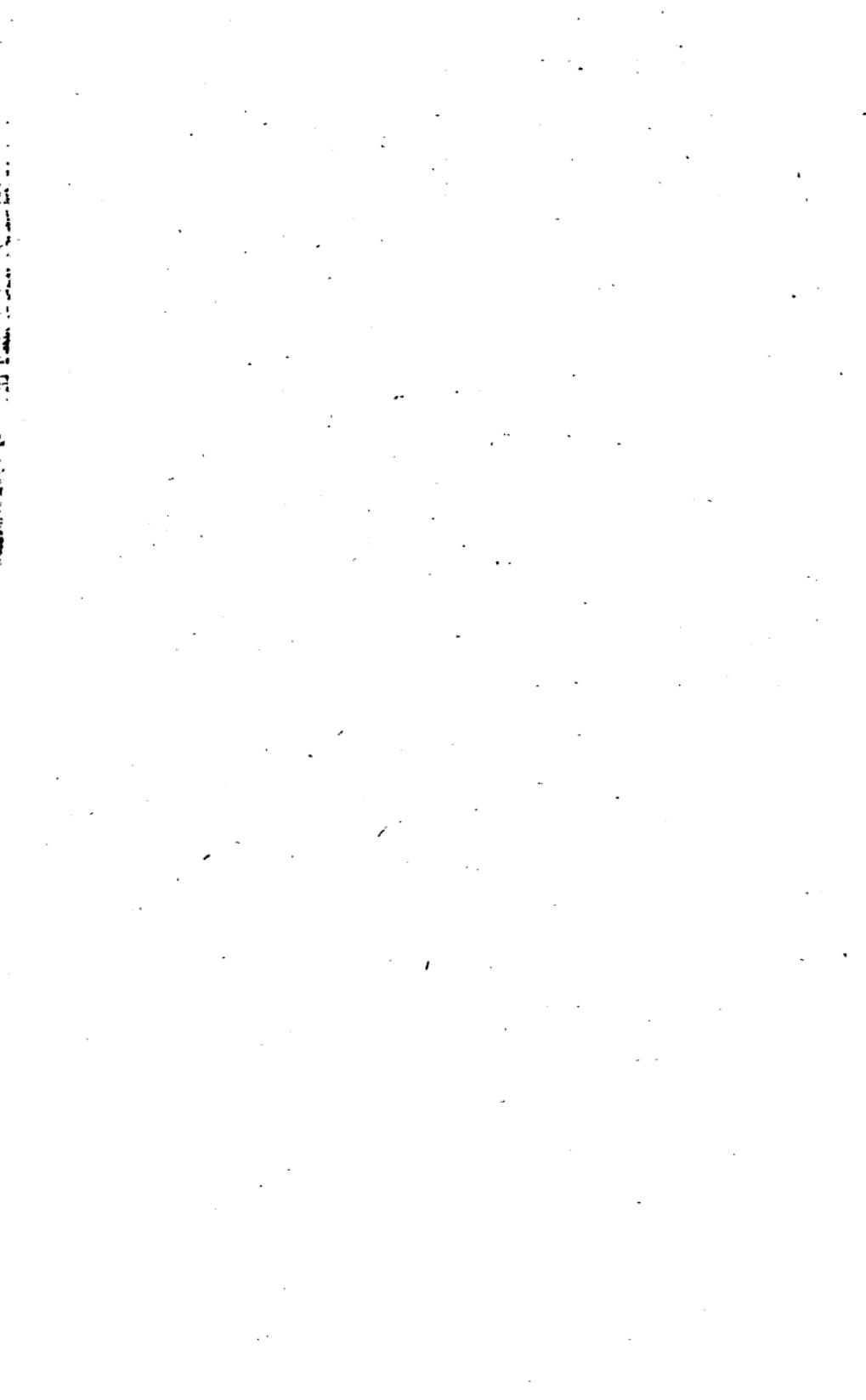
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FLORA HISTORICA.

(3)

FLORA HISTORICA:

OR THE

THREE SEASONS

OF

THE BRITISH PARTERRE

HISTORICALLY AND BOTANICALLY TREATED:

WITH

OBSERVATIONS ON PLANTING,

TO SECURE

A REGULAR SUCCESSION OF FLOWERS FROM THE COMMENCEMENT OF SPRING
TO THE END OF AUTUMN.

BY HENRY PHILLIPS, F.H.S.

AUTHOR OF "*POMARIUM BRITANNICUM*," "*HISTORY OF CULTIVATED
VEGETABLES*," AND "*SYLVA FLORIFERA*."

..... *Florida quisquam*
Hic alibi seruat legat nitidis nectenda capillis.

THE SECOND EDITION, REVISED.

IN TWO VOLUMES.

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S U M M E R.

In all the liveries deck'd of Summer's pride.

MILTON.

When golden morn's resplendent rays
Give lustre to the dewy vale,
Whilst June its rosy bloom displays,
And Eglantine perfumes the gale ;
With shepherds on the thymy down
I love to pass the Summer's day,
Or trace (and mark the Privet blown)
The shady thicket's winding way.

WILLIAMS.

Child of the Sun, resplendent Summer, comes
In pride of youth, and felt thro' Nature's depth :
He comes attended by the sultry Hours,
And ever-fanning breezes, on his way ;
While from his ardent look the turning Spring
Averts her blushing face, and earth and skies,
All-smiling, to his hot dominion leaves.

THOMSON.

VEGETATION now throws off her delicate morning
veil, and dresses in all the magnificence of the
noontide season, that Flora may present her splen-
did court in its fullest attractions to the bright
God of Day. The timid children of the early year
now give way to the more majestic flowers of the

full season, who come clad in all the various hues which mighty Sol has bestowed upon them by his paternal smile, to offer him their odorous homage. We shall therefore speak

————— of plants, divine and strange,
That ev'ry day their blossoms change,
Ten thousand lovely hues !
With budding, fading, faded flowers,
They stand, the wonder of the bowers,
From morn to evening dews.

We would also at this season, without offence to our friends, join Scott of Amwell, and say,

Come, Cynthia, come ! in town no longer stay,
From crowds, and noise, and folly, haste away !
The fields, the meads, the trees are all in bloom,
The vernal showers awake a rich perfume.

Now by these cooling shades,
The beauty of these plants,
By these delightful meadows,
These variegated flow'rs,
By the soft music of the rills and birds,
Let us sit down in joy !

MILTON.

In this delightful garden .
This Paradise of flow'rs,
The gay delight of man,
The treasure of the earth,
The wonder of the world, the work of God.

ANDREINI.

How I rejoice in viewing not alone
These flow'rs, these herbs, these high and graceful plants.

MILTON.

“
LILY. *Lilium.*

Natural Order *Coronaria*. *Lilia*, Juss. A Genus of
the *Hexandria Monogynia* Class.

Ye loftier Lilies, bathed in morning's dew,
Of purity and innocence renew
Each lovely thought.

BARTON.

The Lily's height bespake command,
A fair imperial flower ;
She seem'd design'd for Flora's hand,
The sceptre of her power.

THE beauty and delicacy of the Lily has been celebrated by the writers of all ages, from the time of Solomon to the present day. It was regarded by Christ himself as being more splendid than the great King of Jerusalem in all his gorgeous apparel; and on this account we cannot behold the Lily without feeling a kind of reverence for the flower, mixed with our admiration for its elegance of form and purity of colour.

Observe the rising Lily's snowy grace,
Observe the various vegetable race ;
They neither toil nor spin, but careless grow,
Yet see how warm they blush ! how bright they glow !
What regal vestments can with them compare !
What king so shining, or what queen so fair.

THOMSON.

The common White Lily, *Lilium Candidum*, is undisputedly a native of the Holy Land ; and that a flower of such magnificence of deportment and sweetness of odour should have early attracted the notice of the Greek and Roman naturalists arises from a natural cause, since we find them as anxious to make additions to the plants of their country as the botanist of modern days. The easy propagation of this bulb in those countries soon increased its numbers almost equal to the native plants of those delightful climates.

The heathen nations held this flower in such high regard as to consecrate it to Juno, from whose milk their fable pretends that it originally sprang. And in order that this celebrated flower should lose none of its celestial dignity in the dim eyes of the mortals of our age, who cannot see through the clouds that now obscure Mount Olympus, we shall relate the secret cause from which the Lily blessed the earth.

Jupiter, wishing to render Hercules immortal, that he might rank him amongst the divinities, prevailed on Juno to take a deep draught of nectar, prepared, as we presume, by Somnus, as it is related that the Queen of the Gods fell immediately into a profound slumber, and that Jupiter then placed the infant Hercules to her breast, in order that the divine milk might enter his frame, and so cause his

immortality. The infant, enjoying the delights of the celestial breast, drew the milk faster than he could swallow, some drops of which therefore fell to the earth, from which this flower immediately sprang up; and from this fable it was called *Rosa Junonio*, Juno's Rose.

Alciat tells us, in his celebrated and elegant emblems, that celestial Beauty is represented surrounded by a glory, half of the head hidden in the clouds, and holding a Lily in one hand, and a compass and a ball in the other. The same author says, that Beauty is represented with a garland of Lilies and Violets.

As all nations agree in making the Lily the symbol of purity and modesty, it is the fit attribute of beauty; and perhaps no inhabitants of the earth blend it so happily with the Rose as the fair daughters of Britain. In the Hebrew language, the name Susannah signifies a Lily.

St. Dominic is always represented as holding a Lily, but we do not think that the establishing of the Inquisition in Languedoc justifies the painter in placing so fair an emblem in the hand of one who made converts by the aid of fire and sword, which is so directly in opposition to the mild precepts of Him on whose authority our blessed religion is founded.

We make these remarks, and notice the super-

stitions of former ages, with a perfect assurance that such of our friends as are members of the Roman Catholic church are too liberal to suppose for one moment that we would turn their religion to ridicule sooner than we would offend the Protestant establishment to which we belong. Our duty is to relate ancient anecdotes, by which means the superstitions of old times are exposed, as far as they relate to the vegetable world, without regard to country or sects ; at the same time we are sure that all good Christians must feel regret when they find the heads of any religious sect imposing upon the credulity of the ignorant by pretended miracles.

The continental order of the Blessed Lady of the Lily was instituted by Garcias, the fourth King of Navarre, on account of an image of the Holy Virgin being miraculously found, as it was believed, in a Lily, which, it is said, cured this Prince of a dangerous disorder.

It is related by Bayle, that Charles the Fifth, in his religious retirement, planted a Lily at the end of August, in the year 1558. The monarch died on the twenty-first of the following month, and it is pretended that, at the moment of his death, the bulb of this Lily shot out on a sudden a stem with two joints, supporting flowers as full blown and as odoriferous as these flowers are in Spain in their ordinary season. This beautiful flower was

cut, we are told, and placed upon the great altar of the church of St. Juste on the borders of Castile.

By whom, and at what period this beautiful Lily was brought to this country, is beyond our research; but we may presume that it was amongst the earliest exotics that graced the gardens of England, and probably was one of the plants which we gained from Palestine, by means of the early Crusaders, as Chaucer notices it in armorial bearings.

Upon his crest he bare a tour,
And therein stiked a Lily flour.

It was in the reign of Edward the Third that the Heralds' College was first instituted in England, and in eighteen years afterwards this monarch ordered the arms of France to be quartered with those of England, which continued to emblazon the British arms for four hundred and forty-four years, being most graciously dispensed with in the year 1802, as we have already noticed under the history of the Iris, or Fleur de Luce.

That a clear distinction was made between the Lily and the Fleur de Luce by the Pursuivants at Arms, as early as the time of Edward the Third, is shown by the armorial bearings of the college of Winchester, which is three Lilies on a field sable.

The arms of the city of Winchester are also, sable, three Lilies proper. This college was founded by William of Wickham, a celebrated architect of that reign, who was also Bishop of Winton, and of whom the following anecdote is told. This great man having finished the building of Windsor Castle for his royal master, caused to be inscribed on the wall of the round tower, "*This made Wickham,*" which gave those who envied him the favour of the King an opportunity to hint to the monarch that Wickham arrogated all the honour of that great work to himself; but on being interrogated by Edward, he replied with great pleasantry, that he had not written "*Wickham made this,*" but "*This made Wickham,*" because by his service in this work he had gained his sovereign's princely favour.

The Lily appears to have been a favourite flower with the ancient Greeks; and in the wedding ceremonies of the modern Greeks the priest is supplied with two chaplets of Lilies and ears of corn, which he places on the heads of the bride and bridegroom, as emblems of purity and abundance. All the wedding-party are then crowned with flowers, and as they pass by the houses of their acquaintance, flowers, nuts, and cakes are strewed from the windows.

The Romans seem to have regarded the Lily with

equal admiration, as we learn from Columella that it was preserved or planted in baskets. In his tenth book he says,

Then plant the various flow'rs, these earthly stars,
And Lilies, which in baskets long preserve
Their verdure.

Pliny mentions the Lily as next to the Rose in point of beauty, and tells us that the root when dry was frequently steeped in purple wine, in order that it might produce a purple flower. How far this would cause a change in the colour of the blossom we have not tried, but leave the experiment to the curious.

The common White Lily was so familiar in the time of Queen Elizabeth, that Gerard speaks of it as a native plant; he says, "Our English White Lillie groweth in most gardens of England." He further tells us, that he received roots of White Lilies from Constantinople, under the Turkish title of *Sultan Zambach*, which means Sultan's great White Flowers; but these appear to have been only a stronger variety of the same plant.

The Greeks named this flower Λειψιον and Κρινον. The English name is derived from the Latin, as is also the French *Lis*; the Spanish *Lirio*, the German *Lilie*, the Italian *Giglio*, and the Dutch *Gilgen*, seem also to be corruptions of the same word.

The White Lily is of so easy a cultivation, that

it will prosper in almost any soil and situation; and as it increases readily by offsets from the parent-bulb, it is become a common inmate in most cottage-gardens, and held in less esteem than many inferior flowers, which the difficulty of propagation renders rare, and consequently valuable.

The offsets should be removed from the old bulb every third year, and the month of August is the proper season for transplanting them. They should be covered with about five inches of earth, but on no account should they be removed in the spring of the year, as this is found to check their flowering for several years.

As this species of Lily sends up a stem of from three to four feet in height, it is better calculated to plant amongst shrubs than in the small quarters of the flower-garden; and when mixed with clumps of Roses, the effect is as agreeable to the eye as appropriate to the emblematical combination of Purity and Beauty. It gives a great relief and cheerfulness to heavy clumps of Evergreens, and is a charming embellishment to the borders of woods, or wilderness scenery. The Lily continues in flower from about the middle of June to the middle of August; and as its fragrance is of an agreeable kind in the open air, no garden should be without this noble and highly ornamental flower.

The loyal subjects of France evince their at-

tachment to the Bourbons by a display of these flowers in the saloons of the *noblesse*, and on the counters of the *petites marchandes*.

We have eighteen varieties of the *Lilium Candidum*, and sixteen distinct species of this genus of plants, all of which deserve the attention of the curious florist from their grandeur and beauty.

THE ORANGE LILY. *Lilium Bulbiferum.*

THIS flower, although less elegant in shape, and entirely destitute of fragrance, is a great ornament to the garden, both on account of its stately height, and rich orange-coloured petals. We have many varieties of this species of Lily, some of which are of so great antiquity in our gardens, that Gerard considered them as natives of the British soil. It is found wild in Austria, Italy, and other southern parts of Europe; as also in Siberia and Japan.

The Orange Lily has been known to produce double flowers, but this variety is not permanent. Some years back a bulb of this Lily produced double flowers, in a garden near Ghent, but the succeeding year it returned to its natural shape, and

then again blossomed with double corollas, after which it was entirely lost.

The mythological writers of antiquity have not informed us by what metamorphosis we gained this Golden-petaled Lily, nor do we find it in the floral vocabulary of the East : we must therefore content ourselves with relating a tale of modern times connected with this gay flower : both ruler and rabble may learn a lesson from the experience of the Dutch government of our own day. The disturbances of that country began, prior to the era of the French Revolution, by violent personal attacks on the House of Orange ; and the people, not satisfied with their success in expelling their lawful Prince, carried the spirit of rancour to such a height, that even grave burgomasters, to show their hostility to anything which reminded them of the Stadholder's family, rendered themselves so ridiculous as not only to eradicate the Orange Lily and the Marigold from their gardens, but even prohibit the sale of oranges and carrots in their markets, on account of their being of the aristocratical colour. We have lived to see their banished Stadholder return to this same people, as a King, greeted with exulting shouts of *Oranje boven*. In our sister island, also, many a shillelah and many a head have been broken in endeavouring to defend, or banish the Orange Lily from the bonnet of party.

But to return to the sober delights of the parterre
of Flora, and leave

All which rank Ambition breeds,
Which seem such beanteous flow'rs, and are such pois'nous weeds !
COWLEY.

The trivial name of *Bulbiferum* is given to this Lily from a singular gift of nature, which some of the varieties of this flower possess, that is, of having three distinct modes of propagating its species : first by its oviparous power of producing seeds, or vegetable eggs ; secondly, by its viviparous nature in throwing-off young bulbs, or perfect bodies, from the side of the parent bulb ; and thirdly by a bulbous bud, which is formed in the angle between each leaf and the stem, and which, at maturity, drops off, and taking root in the earth, swells out into the scaly bulb peculiar to Lilies only.

This kind of Lily will prosper in situations that are partially shaded, which makes it particularly desirable for planting amongst flowering shrubs, so as to fill up the vacancies occasioned by the fall of the blossoms of the Lilac and Laburnum. The Orangé Lily is not delicate as to soil, but it flowers strongest in a soft, gentle loam not too moist. The bulbs should be planted in clumps of about five in each clump, separated at about two feet distance each way, and covered with about five inches of mould.

MARTAGON, OR TURK'S-CAP LILY.

OF this elegant kind of Lily we have now several different species, and of each many varieties, all of which are entitled to conspicuous situations in the flower-garden, as well as to embellish the foreground of ornamental shrubberies. This fine flower was first obtained from the Turks under the Turkish title of *Zufiniare*, and the Venetian name of *Marocali*. Dioscorides mentions that these kinds of Lilies grew wild near Laodicea, a city of Asia, now called Ladik, and also near the celebrated city of Antioch in Syria.

Gerard, who wrote in 1596, says, “This plant groweth in the fieldes and mountaines, many daies iourneis beyonde Constantinopole, whither it is brought by the poore peasants to be solde for the decking vp of gardens. From thence it was sent among many other bulbs of rare and daintie flowers, by Master Harbran, ambassador there, vnto my honourable good lord and master, the Lord Treasurer of England, who bestowed them vpon me for my garden.” Gerard therefore calls them *Lilium Bizantinum*, “The Red Lillie of Constantinople.”

This excellent author tells us that he had two other and smaller kinds of these Lilies growing in

his garden, the largest of which was given him by “James Garret, apothecarie, in London, and which at that time bore the name of Martagon, which seems to have been given to these kinds of Lilies by Matthiolus.” Amongst other old names for this flower, we frequently find it called the Lily of Nazareth, which seems to indicate that it came originally from the east to Constantinople.

In the time of Charles I., we appear to have had a great variety of these flowers, as Parkinson, the herbarist and apothecary of that unfortunate monarch, describes no less than a dozen different kinds, which were inmates in our gardens as early as 1629, amongst which he notices the White, the White Spotted, the Blush, the Spotted Canada, the Imperial, the Red Constantinople, the Red Spotted, the Hungarian Bright Red, the Yellow, and the Yellow Spotted; and from the remarks of this writer, we may conclude that its cultivation was then most perfectly understood and more attended to than at the present day, since we have never seen them of such magnificence as this writer describes, who says, they grow three feet high, “where stand many flowers, according to the age of the plant, and thriving in the place where it groweth; in those that are young but a few, and more sparsely, and in others that are old many more, and thicker set, for I have reckoned three-

score flowers and more growing thick together on one plant with me, and an hundred flowers on another." This he calls the Martagon Pompony, and adds that it is of a yellowish red colour. The Dutch florists carried the cultivation of this bulb to great extent in the time of Parkinson ; and at the present day it is not an uncommon sight to see in Ghent a thousand plants of the *Lilium Superbum* in flower at one time, forming the most brilliant effect of Lilies that can be conceived.

The Superb Martagon, *Lilium Superbum*, is a native of North America, and was first introduced (according to Martyn) from Pennsylvania, by Peter Collinson, Esq., in the year 1738, but Aiton makes its introduction as early as 1727. As this and some other of the Martagons are more tender than the common Lilies, it is advisable to cover the bulbs with old tanner's bark or coal-ashes during the winter, which may be removed after the frost is over, and before the plants appear above ground. Where these plants grow naturally, the roots are frequently eaten as food, being first roasted under the embers.

The Tiger-spotted Lily, *Tigrinum*, is a native of China : it was first brought to this country in 1804, and is found equally hardy with the other Lilies of our garden. The Chinese call this flower *Keun Tan*, and it is a plant on which they bestow

much pains and care, in order to make it produce large and handsome flowers.

The root of the common White Lily was formerly esteemed valuable in medicine, but at the present time we believe it is entirely disregarded by the faculty, though it still holds a place in the good housewife's receipts for many cures. Godorus, serjeant-surgeon to Queen Elizabeth, is said to have cured many persons of the dropsy, with the juice of the root mixed with barley-flower, baked in cakes, and eaten with meat, instead of other bread, for the space of a month. The same surgeon relates, that he found by experience that the expressed juice of the bruised root, given for two or three days together in wine, expelled the poison of the pestilence, and caused it to break out in blisters on the skin. Dr. James says, "the flowers and roots are used, and that chiefly in external applications; they are emollient, suppling, and anodyne, good to dissolve and ripen hard tumors and swellings, and to break imposthumations." The root is frequently used for removing corns on the feet. Waller tells us in his Domestic Herbal, 1822, it has been applied externally in that species of abscess in the throat called a quinsy. He recommends three or four of these bulbs to be roasted in the embers till they become soft, then apply them to the part as hot as they can be borne; and he

assures us that he has witnessed a most excruciating pain in the ear instantly relieved by the application of one of these roots.

The ladies on the continent have long held in the highest esteem a cosmetic for the skin, which is prepared from these flowers by means of a vapour bath. It is said to improve and preserve the freshness of the complexion, and to remove pimples and freckles.

STOCK, or GILLYFLOWER. *Mathiola.*

Natural Order *Siliquosæ*, or *Cruciferæ*. A Genus of the
Tetradynamia Siliquosa Class.

Fair is the Gillyflow'r of gardens sweet.

GAY.

And lavish Stock, that scents the garden round.

THOMSON.

Bring hether the Pincks and Purple Callambine,
With Gelliflowers.

SPENSER.

THIS flower, which is now become the pride of every British parterre, from the gay palace to the humble cottage, has been made the emblem of lasting beauty ; for, although it is less graceful than the Rose, and not so superb as the Lily, its splendour is more durable, and its fragrance of longer continuance. It was one of the earliest inmates of our gardens that was planted by the Dames of baronial castles, and from hence it was formerly called Castle Gilloflower, and Dame's Violet ; for Violet was added to the name of many flowers that possessed either a purple tint, or an agreeable perfume. The name of Gillyflower was also common to several plants, as the Wall Gillyflower and the

Clove Gillyflower, &c. Our great lexicographer concludes that the word is corrupted from *July Flower*, because Lord Bacon says, “in July come Gillyflowers of all varieties;” and Mortimer is also quoted, who writes, “Gillyflowers, or rather July Flowers, is called from the month they blow in;” or, says Johnson, “from *Giroflee*, of the French.” It is evidently not derived from *July*, since Chaucer, who frequently uses French words, spells it Gilofre. The learned Dr. Turner, in his History of Plants of 1568, calls it Gelouer, to which he adds the word Stock, as we would say, Gelouers that grow on a stem or stock, to distinguish them from the Clove Gelouers and the Wall Gelouers. Gerard, who succeeded Turner, and after him Parkinson, call it Gilloflower; and thus it travelled from its original orthography, until it was called *July Flower* by those who knew not whence it was derived. The name of Gillyflower is now but little used, and the appellation of these pretty flowers at present rests upon the Stock.

Few flowering plants have been so much and so rapidly improved by cultivation as the Stock, that has within these last two centuries had its nature so completely changed by the art of the florist, that what was, in the time of Queen Elizabeth, but one degree removed from a small mountain or sea-side flower, may now be compared to a

shrub in point of size, whose branches are covered with blossoms but little inferior to the Rose in size, whilst they are as thick set as the flowers on the Mazereon branch, forming, on the whole, a mass of brilliant beauty, that is not exceeded by any of the exotics which Asia, Africa, and America have poured into our gardens of pleasure.

We have seen branches of the Carmine Stock exhibited at meetings of the London Horticultural Society, that had the appearance of ropes of Roses ; and we have had them growing in our own garden of extraordinary size and beauty : but the largest we have yet met with was in the garden of Mr. Stockdale, at Notting-hill, near Bayswater, which measured eleven feet nine inches in circumference, when in flower in the month of May, 1822.

At what exact period we first obtained double flowers from the Stock Gillyflower is uncertain ; but neither Turner nor Gerard appear to have heard of such a thing in their time, although the latter both speaks and gives us a good figure of the Wall Gillyflower in its double state. In the year 1629, both Johnson and Parkinson write on the Stock with double flowers ; so that this improvement seems to have taken place between the reigns of Elizabeth and Charles I., consequently, at the beginning of the seventeenth century ; but it is only within the present century that its high state of

perfection has been achieved. We have two species of Stock indigenous to our soil; but we are of opinion that the Garden Stock has been raised from the seeds of the more fragrant Stock of the Greek Islands, or of Italy, of which Plutarch speaks, in his book *De Amore Fraterno*. It is a plant that delights in the atmosphere of the sea, and, consequently, thrives in Britain, where its culture has been so successful.

————— The garden yields
A soft amusement, an humane delight,
To raise th' insipid nature of the ground,
Or tame its savage genius to the grace
Of careless, sweet rusticity, that seems
The amiable result of happy chance,
Is to create and give a god-like joy,
Which every year improves.

ARMSTRONG.

Gerard only speaks of the purple or violet, and the white Stocks; but Parkinson speaks of the crimson, and the Stock of a fair red colour, as also of the variegated Stock. At the commencement of the eighteenth century, Loudon and Wise, who were the celebrated nurserymen and florists of that age, gave long directions for the management of these flowers, which they then said proved one of the principal ornaments of our garden, from the variety and number of its flowers.

The bright red, or carmine Stock, *Cheiranthus Incanus*, or Queen's Stock, must ever remain the

favourite variety, notwithstanding the love we have for novelty ; and we presume that this flower was brought to its high state of beauty in the neighbourhood of Brompton, as well as the large purple Stock, since Miller speaks of them, in 1724, as the Brompton Stock, by which name also the variety *Coccineus* is now known in most parts of the world. We cannot forbear relating the laughable and beneficial effect the sight and name of this flower had on the spirits of an acquaintance, with whom we were making a tour in Normandy, in the first summer after the return of the Bourbon family to the throne of France. He had been induced to join a small party, and to leave his home, for the first time, to visit the opposite coast ; but so truly British were his habits, that nothing could please or satisfy him. The soup was meagre, the pottage was acid, the peas were sweet, the wine was sour, the coffee was bitter, the girls were brown, their eyes too black, their caps too high, their petticoats too short, their language an unintelligible jargon, their houses old, their inns dirty, the country too open, the roads too straight ; in short, he saw every thing with such discontented eyes as to render the party uncomfortable, until good fortune led us to a rustic inn, where in a small garden were growing several fine Stocks, which he affirmed were the first good things he had seen since he left Sus-

sex ; and on hearing l'Hôtesse acknowledge them as *Giroflier de Brompton*, he insisted on halting at her house, where he treated the party with *un déjeûné à la fourchette*, and left the village with a sprig of the Brompton Stock in his button-hole, his eyes sparkling with champagne and good humour, which lasted for the remainder of the journey, during which time he often said, “ Thanks to the Brompton Stock.”

We shall now proceed to lay down rules for obtaining the Stock in its highest perfection. The first and material point is the choice of seed, which should be saved from those plants that have their petals increased to five or six, as the full flowers never produce seed—yet it is the opinion of most gardeners that they assist in causing other plants to become double; and it will be observed that there is frequently a straggling anther to be found in the double blossoms, which may assist this change by the impregnation of the neighbouring plant : it is therefore a general rule to suffer as many single-flowered plants to remain in the beds as are sufficient to furnish the required quantity of seed.

The beginning of May is the best time for sowing the Biennial Stocks ; and it is recommended to sow them in fresh, undunged earth, when they are intended to remain exposed during the winter ; for

if the earth is too rich they become full of juice, and generally perish by the frost; but this may be prevented by covering them with frames during the severe season. The amateur florist will find the Stock well repay his trouble by the beauty of its flowers, if he attend to the following simple directions—namely, to sow the seeds in a border of rich earth, and when the plants are of sufficient size to remove, to plant them in middle-sized pots, filled with an equal quantity of rotten cow-dung and fresh loam, well mixed. The pots should then be removed to a north-east aspect, where they will receive only about three hours of the morning sun, which is sufficient for them until October, at which time they should be removed, so as to enjoy the full south sun, until the frost is about to set in, when they should be housed; but they should at all times have as much air and sun as possible, and only just water sufficient to keep them from becoming over dry. To procure the petals and flowers of a great size, all lateral shoots should be taken off, which will cause the principal stem to become strong and tall, frequently from two to three feet, and terminated by a spike of flowers ten or fifteen inches in length, adorned with flowers full and round, like roses, frequently measuring between two and three inches in diameter. The Stock, thus treated, is one of the finest flowers that can be

cultivated ; and it may be removed either into the saloon, or sunk into such parts of the flower-border as may offer a vacant space.

These flowers may also be propagated by cuttings after the time of flowering. The cuttings should have the bark turned up about an inch in depth, which will facilitate their taking root ; but these seldom make so fine plants as those raised from seed, though by this means the variety is secured perfect.

We have frequently kept them alive for several years in the open garden by cutting off all the branches that had flowered just as they withered. We should remark, that the Double-White Stock, *Albus*, is of longer duration than either of the others ; and after being so treated for a year or two, the stem becomes woody and firm, so as to resist a moderate frost. Stocks should be planted about five in a clump, which will have a fine bold effect, even when the flowers are single ; and the colours should be kept separate, not mixing the white with the purple or the red, or these last together. We have lately had introduced a pale rose-coloured Stock, which is a delicate and pretty flower. The cinnamon-coloured Stock is also of late importation, but its chief merit is novelty.

The Annual or Ten-week Stock, *Annuus*, is a most valuable variety, since by its aid we can

replace those that may have been lost in severe seasons ; and if sown at three different times, at intervals of about four weeks from each other, a succession of these fragrant flowers may be obtained during several months.

The earliest sowing should be made about the middle of February, upon a very moderately hot bed, so as just to force the plants, which must be guarded against the frost : when of a size to remove, they should be transplanted into a bed with a south aspect, at about four inches' distance, observing to water and shade them till they have taken root ; and in about five or six weeks, they may be transplanted into the borders of the flower-garden, or in clumps in the foreground of the shrubbery. It is from these earliest plants that the finest seeds are generally obtained.

The plants of the May sowing frequently continue in flower until near Christmas ; but if the weather be wet in autumn, they frequently flower with variegated petals, either striped or spotted with red, or purple with white.

PINK. *Dianthus.*

Natural Order *Caryophylleii*. A Genus of the *Decandria Digynia* Class.

Each Pink sends forth its choicest sweet,
Aurora's warm embrace to meet

Mrs. MARY ROBINSON.

Aimable esillet, c'est ton haleine
Qui charme et pénétre mes sens ;
C'est toi qui verses dans la plaine
Ces parfums doux et ravissans.
Les esprits embaumés qu'exhale
La rose fraîche et matinale
Pour moi sont délicieux ;
Et ton odeur suave et pure
Est un encens que la nature
Elève en tribut vers les cieux.

M. CONSTANT DUBOS.

THE Pink, which is now made the emblem of lively and pure affection, may be considered as a child of Art; for in no instance has the skill of the florist been more successful, than in transforming an insignificant weed into one of the most delightful plants which the lap of Flora contains. This flower was entirely unknown to the Greeks, and was also a stranger to the Romans until the time of Augustus Cæsar, when it was discovered in that

part of Spain which is now named Biscay, then inhabited by a ferocious and warlike people called Cantabri. These people, having rebelled against the then masters of the world, were conquered by Augustus ; and during these struggles the plant was discovered and conveyed to Rome, where it was called Cantabrica, after the country from whence it was procured. (Pliny, lib. xxv. c. 8.) Our readers will not be surprised that a people whose principal profession was the art of war, should have attended to so simple a flower as the Pink then was in its natural state, when they reflect, that flowers were esteemed one of the luxuries of those people, who seldom sat at their meals without wearing chaplets of fragrant blossoms ; and as novelty has ever had its charms, a new flower possessing a spicy fragrance would naturally excite considerable attention.

Dr. Turner, one of our earliest writers on plants, calls it Cantabrica Gelouer, and from him we learn that it was then cultivated in our gardens, since he says—" The gardin Gelouers are made so pleasant and swete with the labours and witt of man, and not by nature."

Monsieur Pirolle seems of opinion that it was originally brought from Africa, since he says it anciently bore the name of *Tunica*, and *Herbe*

tunica, which seems to indicate that it was a plant from Tunis.

Shaw considered it a native of Italy when he wrote—

In fair Italia's bosom born,
Dianthus spreads his fringed ray ;
And glowing 'mid the purpled morn,
Adds fragrance to the new-born day.

Oft by some mould'ring time-worn tower,
Or classic stream, he loves to rove,
Where dancing nymphs, and satyrs blithe,
Once listen'd to the notes of love.

Sweet flower, beneath thy natal sky
No fav'ring smiles thy scents invite ;
To Briton's worthier regions fly,
And paint her meadows with delight*.

The modern generic name of *Dianthus*, which has been bestowed upon this fragrant flower, is derived from the two Greek words, Διός and αθος, which signifies Jove's flower.

Like that sweet flower that yields great Jove delight ;
Had he majestic bulk, he'd now be styled
Jove's flower ; and, if my skill is not beguiled,
He was Jove's flower when Jove was but a child.
Take him with many flowers in one conferr'd,
He's worthy Jove, e'en now he has a beard.

COWLEY.

The French name of *Œillet* signifies a little eye, and our name of Pink seems to have been derived from the Dutch name of *pink*, for an eye, and bestowed upon it on the same account.

* The modern Italians hold perfumes in aversion.

Shakespeare uses the term of pink-eyed, to express a small or sparkling eye :

Come, thou monarch of the vine,
Plumpy Bacchus, with pink eyne.

He also uses the word pink as an expression of superior excellence,—as

I am the very pink of courtesy.

But to proceed in the history of this Pink of flowers, we go back to the days of Queen Elizabeth; from whose vegetable historian, Gerard, we learn that it was then cultivated in its improved double state; and he is the first writer who calls them “ Pinks, or Wild Gilloflowers,” from their being smaller than the “ Clove Gilloflower, or the Carnation,” which were also known at that time in English gardens.

England, Spain, France, Germany, and most other temperate and warm climates, possess a native Pink ; but to state how many of them have been changed by cultivation, and from which each peculiar variety first sprang, would be as arduous a task as to attempt to define the parentage of each peculiar apple, which, like the Pink, owes its excellence and variety to the labours of the cultivator. And the Pink, like the apple, continues to demand the attention of man to preserve it from degenerating into its original insignificance ; for although the

hand of the gardener can double and triple the petals of the Pink, he cannot render their beauties permanent. Nature seems to have allowed her works to bear a temporary improvement only, in order to create industrious habits in man, her most noble and finished work.

The primitive Pink is simple red or white, and scented : by floriculture its petals have been enlarged and multiplied, and its colours infinitely varied, until it has obtained all the colours, from the darkest purple to the purest white, with all the hues of red, from the rich crimson to the pale rose, with which also the yellow is frequently blended. In some of these flowers we see the eye of the pheasant painted ; others are beautifully marbled, striped, or figured. In some varieties we see two opposite colours abruptly diversified ; whilst in others they seem not only to meet in happy contrast, but to mingle and soften off in shades. Thomson speaks of it as the “gay-spotted Pink ;” but under all its diversities it preserves its delicious spicy fragrance, which never leaves it, however incessantly it inclines to quit its artificial adornment to take its own simple attire. Maddock lays down as the criterion of a fine double Pink, that “the stem should be strong, elastic, and erect, and not less than twelve inches high ; the calyx rather smaller and shorter, but nearly similar in form and proportion

to that of a Carnation, as well as the formation of the flower, which should not be less than two inches and a half in diameter ; the petals should be large, broad, and substantial, and have very fine fringed or serrated edges, free from large, coarse, deep notches or indentures : in short, they approach nearest to perfection when the fringe on the edge is so fine as scarcely to be discernible ; but it would be considered a very desirable object to obtain them perfectly rose-leaved, *i. e.*, without any fringe at all ; the broadest part of the lamina, or broad end of the petals, should be perfectly white and distinct from the eye, unless it be a laced Pink, that is, ornamented by a continuation of the colour of the eye round it, bold, clean, and distinct, leaving a considerable proportion of white in the centre, perfectly free from any tinge or spot : the eye should consist of a bright or dark rich crimson, or purple, resembling velvet ; but the nearer it approaches to black, the more it is esteemed : its proportion should be about equal to that of the white, that it may neither appear too large nor too small."

Although our forefathers might not have carried refinement so far as to have laid down rules for the government of our admiration towards flowers, yet we find Professor Martyn wrong when he states that the Pink had not attracted any no-

tice amongst our ancestors; and that it is only within the last half of the eighteenth century, that Pinks were much improved and varied, so as to be greatly valued amongst florists. We have already shown that they were cultivated in the reign of Elizabeth; and Parkinson enumerates many fine varieties that were favourites in the time of his unhappy master Charles the First.

The White Pink is one of the flowers which Milton calls for in his monody on Lycidas; and Loudon and Wise, so celebrated for having laid out the gardens of Blenheim, and improving those of Kensington, give more pages on the cultivation of the Pink than on that of any other Plant contained in their "Retired Gardener" of 1706.

Madame de Genlis tells us that it was the good King Rene of Anjou, the Henry the Fourth of Provence, who first enriched the gardens of France with the Pink; and to this day it remains a favourite flower in the neighbourhood of Toulouse, although it is much less frequent in the vicinity of Paris than formerly.

It is a flower that has attracted the particular notice of Princes. The Great Condé, whilst a prisoner in the Bastile, amused himself in the cultivation of Pinks, which induced Madame de Scuderi to make the following verses on the subject—

En voyant ces œillets, qu'un illustre guerrier
Cultive d'une main qui gagna des batailles,
Souviens-toi qu' Apollon a bâti des murailles,
Et ne t'étonne plus que Mars soit jardinier.

There is an anecdote connected with the Pink, which shows how far the mind may be led away and debased by the arts of flattery.

The young Duke of Burgundy, grandson of Louis the Fifteenth, being fond of cultivating these flowers, a flatterer persuaded him, by substituting other pots of Pinks for those which the Prince had reared, that the Pinks which he planted came up and flourished in one night. Thus persuaded, the youthful Prince believed that Nature obeyed his will. One night, not being able to sleep, he expressed a wish to get up, but was told that it was then the middle of the night : " Well," replied he, " I will have it be day."

It has been observed that the Pink has lost its powerful attractions for the nobility of this country, and is degenerated into a mechanic's flower, because its cultivation is so carefully and successfully attended to in manufacturing districts, and more particularly at Paisley. But this is erroneous as far as relates to good taste, as we have frequently noticed with what delight these flowers have been regarded by the most refined classes of society, when they have met with them in village gardens ; for their own florists having of late years been so

much engaged in the culture of rare plants, known ones have too frequently been neglected.

How forcibly does the sight of the Pink carry our imagination back to the well-known cottages of our infant days, and how often does the picture present itself, showing where

A path, with Pinks and Daisies trimm'd,
Led from the homely entrance-gate ;
The door, worm-eaten and decay'd,
Bespoke the tenant's low estate.

It is in such situations that flowers have the power of delighting the English traveller, because in most other parts of the world he finds his fellow-creatures too often debarred from these innocent luxuries, that endear his home to the English cottager, and render his limited bounds a sufficient substitute for a proud domain. With what pride and satisfaction do we see him regard his plants on the morning of a fine sabbath-day, surrounded by his neatly-clad family, or collecting a nosegay for the charitable wife of his employer. These are scenes that are the particular boast of England, but, like the Pink, they require careful attention to prevent their degeneration. Give the cottager a garden, and you bar up the ale-house ; for the mind of the most illiterate man will occupy itself in leisure, and when domestic employ is not found to amuse, idle politics are sure to attract to the chequered post.

But to return from these digressions to the cultivation of the Pink:—we must first observe that new varieties can only be raised from seed, and that when favourite kinds are so procured they may be increased by pipings; and although we may have a sufficient number of these plants, this practice must not be neglected, as old woody plants frequently degenerate or perish during the winter. During the winter of 1821-2, which was unfavourable to Pinks, more than half of those flowers in the country lost their character; so that the summer of 1822 produced only White Pinks, excepting the old Red Pink, which has given name to a kind of rose-colour, and this variety we observed retained its natural colour in all situations.

Mr. Hogg, a successful cultivator of this and some other flowers, says that Pinks should never be suffered to remain longer than two years without either change of soil or situation; and that when they are moved or transplanted in the spring they never do well, or show half the beauty which those do that are planted in September; the laced Pinks, in particular, appear almost plain, and without their distinguishing character.

The soil recommended by Maddock for Pinks is “a good fresh loamy soil, dug and comminuted about two feet deep, and manured with a stratum of cow-dung, two years old, mixed with an equal

proportion of earth : this stratum to be about six inches thick, and placed five or six inches below the surface, is all the preparation or compost that appears necessary for this flower ;” but Emmerton says that “ Pink beds should be top-dressed in the spring, if you have a desire to excel in blooms, with some old night-soil, or sugar-baker’s scum, finely sifted and sown over it ;” and he adds, that the strong-blown plants should not be allowed to bloom more than eight or ten blooms, and those that are weaker, and of a less size, not more than four.

It will be observed that large strong plants will send up a great number of flower-stems, all the weakest of which should be thinned out a month or six weeks before bloom, as by this means the strong and leading stems, which proceed from the heart or centre of the plant, will receive more nourishment, and consequently produce finer flowers—to assist which, also, all the small lateral pods should be cut off with a pair of scissors.

As we decidedly object to square beds for any description of flowers that are placed in ornamental gardens, we recommend that circular holes should be dug out, and filled with the proper earth, or compost, raised somewhat above the level of the border ; and that from five to seven plants should be placed in a star shape, at about six or nine

inches apart, which will eventually appear as one large plant, and give a much finer effect than a large straggling plant. It should be remembered, that the largest and most bushy plants do not produce the finest flowers, for they naturally put forth numerous but small stems, which one root is not able to support so as to produce a number of fine large flowers: besides which, when young plants are placed singly on the borders, there is not sufficient show of blossoms to render them attractive, or to afford sufficient fragrance; and it is also less troublesome to make a few holes to receive the proper compost, than to give it separately to each plant. The blue colour of the grass leaves of the Pink is likewise very ornamental in the winter months by its contrast with the colour of the grass lawn, or the foliage of those plants which retain their leaves; it is therefore desirable to form the clumps of sufficient size to give effect, always bearing in mind that the Pink loves an open situation and a pure air, with a south-east aspect.

Clumps of Pinks would appear to great advantage if formed immediately on grass lawns: in this case they must be planted sufficiently thick to hide the earth; but until their growth is formed, moss of any kind may be strewed over the vacant space, which can be removed as the Pinks increase in size.

The mode of raising these plants from seed will

be found under the head of Carnation. The most rare varieties are propagated by layers, but they are more generally increased by pipings, which should be taken off the plants immediately previous to, or during the time of flowering; about midsummer is the general season for this operation, which is the same as that of piping Carnations.

When roots of Pinks become old and woody, they should be taken up either in the autumn or early in the spring, and divided into slips, which will become good plants if set tolerably deep, and kept moist until they have made new roots. The grass leaves should also be cut short when the slips are planted, and all withered leaves carefully removed.

The Pink is one of the most desirable flowers we possess as an ornament for apartments, since its odour is rather of a refreshing than a faint nature, and it retains its beauty longer without fading, when placed in water or sand, than almost any other blossom: and as it is less affected by the steam of hot dishes than flowers in general, it is well calculated for the epergne of the dinner table. Its delicate long stalks also enable the hand of taste to distribute the Pink into more graceful groups than can be formed of heavier blossoms.

The plain White Pink is made to represent purity of sentiment; and the Red Pink is the emblem of talent, in floral language.

SWEET-WILLIAM, OR BEARDED PINK. *Dianthus Barbatus.*

Sweet-William small has form and aspect bright,
Like that sweet flower that yields great Jove delight.

COWLEY.

THE Sweet-William is a species of Pink indigenous to Germany, from whence it has been scattered over all parts of Europe; for what it wants in fragrance it supplies by masses of flowers and splendour of colours, so as to ensure it a welcome reception in all classes of gardens. Its large and compact umbel of variegated flowers may be considered as Flora's colour-palette, on which she has frolicked, varying her favourite dyes to display all her gayest tints of reds and purples, mingled with pure white and jetty black, disposed in stars, as thickly set, and as bright as the eyes of Argus; so that one stem supports a large and brilliant bouquet: on which account the Dutch gardeners formerly gave it the name of *Keykens*, which is their familiar term for a nosegay or large bunch of flowers. The French also distinguish it by the name of *Œillet bouquet*, Nosegay of Pinks, and *Bouquet parfait*, perfect Nosegay; it is also called *Œillet de Poëte*, Poet's Pink.

The Sweet-William seems to have escaped the

attention of the ancients, since we do not find it described by any of their writers. D. Rembertus Dodoneus, who was physician to the emperor Charles the Fifth, is the first author who seems to have noticed this plant ; he tells us, in the second part of his History of Plants, chap. 7, that it grows in sunny situations on rough hilly places in Germany. This author calls it *Americus flos* and *Colmenier* ; he tells us also that this plant had been found growing wild, but with very small flowers, in some parts of Flanders. We met with it also in the wild state on the hills in Normandy, some distance west of Dieppe, but the flowers were scarce larger than those of the London Pride, *Saxifraga umbrosa*, but possessing all the true character and fine pencilling of colour of the Sweet-William. The plants were about three inches in height, and growing in an uncultivated spot, at such a distance from any dwelling or garden, as to justify the opinion of its being a native of that part of France, rather than a degenerated plant escaped from the garden.

Dr. Turner has not noticed the Sweet-William in his work of 1568 ; but in twenty-nine years after, it is mentioned by Gerard, as a common flower in the gardens of that age, and where we may presume it had long held a situation, since, amongst other names, it was called “ London

Tuftes." Gerard calls them Sweet-Williams, but on what account they were so named we are left to surmise, unless we could persuade ourselves that they were so called after the greatest man of that age, William Shakspere. Gerard notices many varieties, both with double and single flowers; he says, " We have in our London gardens a kinde hereof, bearing most fine and pleasant white flowers, spotted very confusedly with reddish spots, which setteth foorth the beautie thereof, and hath beene taken of some to be the plant called of the later writers *Superba Austriaca*, or the pride of Austrich." This author quaintly observes, " These plants are kept and maintained in gardens, more for to please the eie, than either the nose or belly."

In the floral vocabulary, the Sweet-William is made the hieroglyphic of *finesse*.

In the inimitable imitation of the bard of Mar-mion, the flames of Drury are represented as giving to every object the hue of this flower :

To distant fields the blaze was borne ;
And Daisy white and hoary Thorn
In borrow'd lustre seem'd to sham
The Rose or Red Sweet Wil-li-am.

Rejected Addresses.

This species of *Dianthus* has been named *Bar-batus*, from the hairy or pointed scales of the calyx.

The easy culture of this plant, and its hardy

nature, which reconciles itself to almost every soil and situation, has rendered it common to every cottage-garden, without lessening its charms: for its varieties are so infinite, that we scarcely ever met with the same in any two gardens; and when large clumps of them are in full flower, their gaiety in mass is such as not to be eclipsed by the proudest plant of the parterre—whilst their individual beauty exhibits such lovely dyes, and finished pencilling, as to defy imitation: the colours of the corollas are also frequently found to vary considerably on the same branch.

The seeds of these plants should be saved from the finest varieties, both dark and light-coloured; and these should be sown annually, for although they are perennial plants, they are subject to straggle and decay. The seed should be sown about the beginning of April, on a border of light earth, and in June they will be fit to transplant out, which should be done in clumps as we have directed for Pinks, excepting that they may form larger clumps, and those may be placed more in the back ground than Pinks, and to fill vacant spaces amongst shrubs, that require a gay contrast, as their brilliancy of colour gives a great cheerfulness to such scenes.

The choice varieties of this plant may be increased and preserved by slips, layers, or cuttings,

which should be planted about Michaelmas, in a soil neither too light nor too heavy or stiff: dunged ground should also be avoided for this plant, as it occasions it to rot.

The Sweet-William is too formal a flower to grace the alabaster or china vase, and its want of perfume also unfits it for the saloon; yet it is a favourite in country bough-pots, from the long duration of its flowers, which continue to give fresh blossoms in the water, and which being generally of a paler colour than those which had expanded in the open air, the umbel becomes a mottled mass of variegated petals.

THE CHINA, or INDIAN PINK. *Dianthus Chinensis.*

With hues on hues expression cannot paint,
The breath of nature and her endless bloom.

THOMSON.

THIS gaily-painted flower, which we have borrowed from the fertile soil of China to decorate the gardens of Europe, seems to form a link between the Sweet-William and the fragrant Pink, partaking in some measure, of the character of each: in richness of colour it excels the former flower, and its

time of flowering is of much longer duration, since it generally commences to expand its corollas in July, which follow each other in succession until the frost forbids our hardiest flowers to shine: but as the flowers are placed singly on branching stems, like those of the common Pink, they never present that fine mass of colour which the large umbel of the Sweet-William exhibits, and they are entirely deficient of the fragrance for which the Pink is so much admired: yet we must acknowledge them an acquisition to the parterre, from the glowing and vivid red colours they display.

The seeds of this species of *Dianthus* were first sent from China to Paris by the French missionaries, about the year 1705, but the double varieties of these flowers had not been seen before the year 1719, when they were frequent in some of the Parisian gardens. Aiton notices the introduction of the China Pink in England as early as 1713; but Miller was certainly unacquainted with it in 1724, as he describes the Indian Pink as bearing yellow flowers only, and tells us that he takes the description from the written account of Monsieur Liger; but as that author's work, *Le Jardinier, Fleuriste, et Historiographe*, was published in 1703, two years before the seeds had arrived from China, it is clear that the India Pink of Monsieur Liger was a different plant.

There is no doubt that this flower has been greatly improved by the cultivation of European gardeners since its first arrival from China.

The *Dianthus Chinensis* is generally treated as an annual plant, because when raised from seed it produces flowers and ripens its seed in the same year: but the plants may be preserved for several years if planted in a dry soil, or in loamy earth mixed with a portion of old lime rubbish; and those that are preserved over the winter produce their flowers both earlier in the season and in greater numbers. Those plants intended to be treated as bi-annuals should have their flower-stalks cut down before the seeds are ripe.

It is recommended to sow the seeds upon a gentle hotbed about the beginning of April, observing to give them free air when the plants appear above the earth. They are generally of a size to transplant in about a month, and they should be planted in clumps of considerable size, as they make but little show when planted singly.

We prefer the China Pink in its single state, because the beautiful marks of colouring on the petals are then seen distinctly, which are obscured when the petals are multiplied; but as florists in general prefer these plants with double flowers, we shall notice the best mode of procuring them in that state, which is, to draw out all the plants with single

flowers so soon as they can be ascertained, in order that their farina may not be suffered to impregnate the stigmas of the double flowers, and thus affect the seed of the favourite kinds. Fine varieties of these plants may be preserved by raising them from slips, which should be kept moist and shaded until they have taken root; and if planted in pots, they can be secured from frost by removing them into a green-house, where they should have as much air and light as possible, but little water.

In the Dictionary of Floral Hieroglyphics, the China Pink is made the representative of Aversion.

CLOVE AND CARNATION. *Dianthus*
Caryophyllus.

Let you admired Carnation own,
Not all was meant for raiment, or for food,
Not all for needful use alone;
There while the seeds of future blossoms dwell,
'Tis colour'd for the sight, perfumed to please the smell.
SHENSTONE.

THESE delightful flowers, which, next to the Rose, are now become favourites with all the florists of Europe, are children of art, having been raised from a small kind of Red Clove Pink, which is thought to be a native of our climate, since it has frequently been found growing in the wild state on rocks and

old walls, and in other situations where the soil was dry. We have already noticed how little the ancients knew of the Pink; and that the Clove and Carnation were altogether unknown to them is perfectly clear, for they are neither of them mentioned by their natural historians, or celebrated by any of their bards, who would not have failed to have sung the praises of such aromatic flowers, since the Clove-spice was known to them and much admired.

We learn from Chaucer, the father of the English poets, that the Clove Gillyflower was cultivated in this country as early as the reign of Edward the Third, and that it was used to give a spicy flavour to ale and wine; and from hence it was called Sop in wine:

Ther springen herbes grete and smale,
The licoris and the setewale,
And many a clove gilofre,
— to put in ale,
Whether it be moist or stale.

CHAUCER.

It seems to have been a flower of high estimation in Queen Elizabeth's time, for we find it often celebrated by the poets of her day. Spenser, who was remarked for his care in retaining the old manner of spelling, calls them Coronations, probably because they were used on those festive occasions, and from hence the name of Carnation seems a corrup-

tion. Some writers are of opinion that they were called Carnation after a flesh-colour so distinguished, whilst others suppose that the colour was so named from the tint of the Carnation flower.

Carnation'd like a sleeping infant's cheek.

LORD BYRON.

Spenser says, in his Shepherd's Calendar,

Bring hether the Pincke and Purple Cullambine,
With Gelliflowres ;
Bring Coronations, and Sops in wine,
Worn of paramours.

Drayton also speaks of them under the name of Sops in wine,

Sweet-Williams, Campions, Sops in wine,
One by another neatly.

Shakspeare says, by the mouth of Perdita,

The fairest flowers o' the season
Are our Carnations, and streak'd Gillyflowers,
Which some call Nature's bastards : of that kind
Our rustic garden 's barren ; and I care not
To get slips of them.

POLIXENES. Wherefore, gentle maidan,
Do you neglect them ?

PERDITA. For I have heard it said,
There is an art, which, in their piedness, shares
With great creating nature.

The name of Clove, as well as that of *Caryophyllus*, was given to this species of *Dianthus*, from the perfume being similar to that of the spice so called ; and the flower was, on that account, frequently used to flavour dainty dishes as well as

liquors, and it was also thought to possess medicinal properties. Gerard says, "The conserue made of the flowers of the Cloue Gilloflower and sugar is exceeding cordiall, and woonderfully aboue measure doth comfort the heart, being eaten now and then." It was also thought good against pestilential fevers. Gerard tells us also that he had a Carnation with yellow flowers, "The which (he says) a worshipfull merchant of London, Master Nicholas Lete, procured from Poland, and gaue me thereof for my garden, which before that time was neuer seene nor heard of in these countries." From this account we not only learn that it was a flower then cultivated in different parts of Europe, but we find with what care they were procured from distant countries. The Yellow Carnation is still scarce in this country; and although it is more frequently seen in the vicinity of Paris than in the neighbourhood of London, yet is it not so common in France as other varieties, though Parkinson speaks of the Yellow or Orange-tawny Carnation as producing seed in this country much freer than any other kind of Carnation, and from which, he says, numerous varieties were raised.

This author enumerates by name forty-nine kinds of Carnations that were cultivated in the time of Charles the First, whose Queen was excessively fond of flowers; but although it appears that varie-

ties were then procured from France and other parts of the continent, yet the largest and principal kind of Carnation was then distinguished by the name of the Old English Carnation.

During the civil commotions of the latter part of the reign of Charles the First and of the commonwealth, this flower seems to have been nearly lost in England, as Mr. John Ray remarks, in the Flora which he published in 1665, that we had formerly many good kinds, but that few of them were then to be found in any of our gardens. The Dutch had then taken up the cultivation of the Carnation, and we renewed our gardens with these flowers from Holland during the reign of Charles the Second, as Ray observes, " Of these Dutch flowers I have known more than a hundred distinct varieties, by several names, all of them fair, large, and double flowers." He also remarks, that these plants were not so hardy as those that had been formerly cultivated in England. In a later edition of Mr. Ray's Flora, three hundred and sixty good sorts of Carnations are enumerated; and to show how high this flower was in the estimation of that author, we give his own words :

For various colours Tulips most excel,
And some Anemones do please as well ;
Ranunculus in richest scarlets shine,
And Bear's Ears may with these in beautie joyn :
But yet if ask and have were in my power,
Next to the Rose, give me the Gilliflower.

As the Carnation possesses some advantages even over the queen of flowers, we regret to see its cultivation so little attended to in this country, for at the present time it is confined to a very small number of cultivators ; and although it is generally admired as the pride of Summer flowers, we do not meet with a collection in one garden out of fifty : yet in the vicinity of Paris it is cultivated to so great an extent, and the flowers frequently brought to market in such quantities, that we have known a whole side of the large *Marché de Halle* perfumed with the fragrance of the Carnation bouquets, which *les dames de Halle* were offering to each passenger for a few sous; whilst the agreeable *Marché aux Fleurs* was at the same time covered with these plants in pots, for the purpose of decorating the courts of the hotels.

The advantage of the Carnation over the Rose, when cut as an ornament for apartments, is the long continuance of its beauty, when placed in vases of water, or wet sand. When placed in water, a small piece of nitre should be added ; and the water should be changed every day, and a small piece of the flower stalks cut off each time of giving fresh water, which will prolong their freshness for a considerable length of time. It is as common to see large vases filled with these flowers in the retail shops of Paris during the

summer season, as it is to find fires in the London warehouses during the winter months. The Red Clove Pink is worn in France to distinguish the liberal party.

With a hope of seeing these flowers increased in our country gardens, so as to furnish our markets more plentifully, we give what is now esteemed the criterion of a fine Carnation, and then notice the most approved manner of its cultivation.

Modern florists divide these flowers into three classes, Flakes, Bizarres, and Picotées. The Flakes are so called from having two colours only, and their flaky stripes going quite through the petals. Bizarres are so named from the French word, which signifies odd or fantastical. These kinds have not less than three colours, and are variegated in irregular stripes or spots. Picotée is a corruption of the French *Piquettée*, pricked or spotted. These flowers are distinguished by having a white ground, pounced or spotted with purple, rose, red, or other colours. These classes are again subdivided, as Pink, Flakes, Scarlet Flakes, Purple Flakes, Yellow Flakes, &c., and the Picotées and Bizarres run through the same changes almost to an endless amount. Mr. Hogg, who published a treatise on the Carnation in 1820, gives a catalogue of about three hundred and fifty sorts, so arranged and named after some great personages, all of which

were in his possession when he published his work ; and we hope to hear that both Mr. Hogg's treatise and collection of plants may induce, not only amateur florists, but market-gardeners, to bestow more attention on the propagation of these delightful flowers, as they will be sure to find not only praise, but a price in the market. And let them not be deterred, although they be not quite perfect, according to the rules laid down to guide our admiration, which say, of a perfect Carnation, " The stem should be strong, tall, and straight, not less than thirty, not more than forty-five inches high ; the foot-stalks supporting each separate flower should be strong, elastic, and of a proportionate length. The flower should be at least three inches in diameter, consisting of a great number of large well-formed petals ; but neither so many as to give it too full and crowded an appearance, nor so few as to make it appear too thin and empty. The petals should be long, broad, and substantial, particularly those of the lower or outer circle, commonly called the guard-leaves ; these should rise perpendicularly about half an inch above the calyx, and then turn off gracefully in a horizontal direction, supporting the interior petals, and altogether forming a convex, and nearly hemispherical, corolla. The interior petals should rather decrease in size, as they approach the centre of the flower, which

should be well filled with them. The petals should be regularly disposed alike on every side, imbricating each other in such a manner as that both their respective and united beauties may captivate the eye at the same instant: they should be nearly flat, however, a small degree of concavity or inflection at the lamina, or broad end, is allowable; but their edges should be perfectly entire, that is to say, free from notches, fringe, or indenture. The calyx should be at least one inch in length, terminating with broad points, sufficiently strong to hold the narrow bases of the petals in a close circular body. Whatever colours the flower may be possessed of, they should be perfectly distinct, and disposed in long narrow stripes, broadest at the edge of the laminæ, and gradually becoming narrower as they approach the unguis, or base of the petal, there terminating in a fine point. Each petal should have a due proportion of white, *i. e.*, one-half, or nearly so, which should be perfectly clear and free from spots. Bizarres, or such as contain two colours upon a white ground, are esteemed rather preferable to Flakes, which have but one, especially when their colours are remarkably rich, and very regularly distributed. Scarlet, purple, and pink, are the three colours most predominant in the Carnation; the two first are seldom to be met with in the same flower, but the two

last very frequently. When the scarlet predominates, and is united with a paler colour, or, as it sometimes happens, with a very deep purple upon a white ground, it constitutes a Scarlet Bizarre, of which there are many shades and varieties, some richer, and others paler in their colours, as is the case with all the rest. Pink Bizarres are so called when the pink abounds, Purple Bizarres when the purple abounds : Crimson Bizarres consist of a deep purple and rich pink. When the Pink Flake is very high in colour, it is distinguished by the appellation of Rose Flake ; but some there are so nearly in the medium betwixt a pink and a scarlet, that it can scarcely be defined to which class they belong. In addition to the foregoing varieties, there is a sort held in great esteem by cultivators called Picotée, many of which kind are very beautiful, and being hardier than the other sorts, are in considerable request. The colours are principally yellow, and white spotted ; their properties are the same as the other kinds, except that the edges of the petals are serrated or jagged, and the colour is disposed in spots where the others are striped."

The propagation of these plants is by layers and pipings for continuing approved sorts, and by seed for procuring new varieties.

The soil which Maddock recommends is formed

into a compost, by adding “ one-half rotten horse-dung, one year old, or that has been used as a hotbed for cucumbers, melons, &c., one-third fresh sound loamy earth, one-sixth coarse sea or river sand. These ingredients are to be mixed together in autumn, laid in a heap about two feet thick, in an open exposure, and turned three or four times during winter; or, otherwise, the dung alone, after being used as a hotbed, may be thrown together in a heap, in a conical form, in order to rot more perfectly; and, as its surface freezes in winter, it should be pared off, and laid on one side, till the whole mass has been thoroughly frozen throughout: this may be repeated as often as the season permits, and it will be completely fit for use the following spring. The earth and sand may be added to it in March, when wanted to fresh pot the plants for bloom; the whole should then be well mixed and incorporated together, and passed through a coarse screen or sieve, to reduce its parts and take out stones, or any other extraneous substances which it may contain. In country places where the air is more pure, experience has pointed out the propriety of using less dung and more loam; the proportions of which, for such situations, may be reserved, *viz.*, one-half loamy earth and one-third dung, with the sand as before specified: the preparation of the compost, in other

respects, is to be exactly the same in all situations."

Mr. Hogg recommends the following compost : "Three barrows full of loam, one and a half ditto of garden mould, ten ditto of horse-dung, one ditto of coarse sand, to be mixed and thrown together in a heap or ridge, and turned two or three times in the winter, particularly in frosty weather, that it may be well incorporated. On a dry day towards the end of November, take a barrow full of fresh lime, which, as soon as it is slackened, strew it over while hot in turning the heap ; this accelerates the rotting of the fibrous particles in the loam, lightens the soil, and destroys the grubs, worms, and slugs.

" If there has been much rain during the winter, so that the strength of the compost is reduced, and the salts washed from it, I take (says Mr. Hogg) about seven pounds of damaged salt, and add them to it, either dissolved in water, or strewed over with the hand. This, from an experience of three years, I have found to be attended with the most beneficial effect upon the future health and vigour of the plants. During very heavy rains many florists cover their compost with tarpaulin, or double mats, to prevent the nutritious particles from being washed out : this is also an excellent precaution.

“ If any objection be started that the quantity of dung is too great in proportion to that of the loam, I answer, that such an objection might be well founded, if the compost were to be used immediately on its being mixed together ; but, as it has to lie six months before it is used, I am decidedly of opinion that the quantity is not more than is necessary, in order to ensure a luxuriant growth and a generous bloom.”

Mr. Hogg lowers the compost for the yellow Pincotées and such flowers as are apt to sport in colour, as Humphrey’s Duke of Clarence, Plummer’s Lord Manners, &c. : for these he recommends three barrows of sound staple loam, two ditto of old rotten cow-dung, one ditto horse-dung, a half ditto sand, a half ditto lime rubbish, or old plaster, to be well prepared, and incorporated as before.

Mr. James Justice, a celebrated Scotch florist of the middle of the last century, observes, that Carnations must never be planted in earth where Hyacinths have grown, those flowers, from certain experience, being a sure poison to the Carnation, and *vice versa*.

The Carnation does not readily ripen its seed in this country, owing to the late time of its flowering, which is overtaken by the moist and cold months before it has time to come to maturity. In the summer of 1818, however, from the warmth of that

season, a considerable portion of seed was ripened. The seed is generally procured from Vienna, and different towns in Switzerland ; and when put in phials, and well corked, will keep good for several years.

The seed should be sown about the middle of May, in pots filled with the compost, on which the seeds should be scattered, and then a light mould sifted over them, just sufficient to cover them : the pots should then be placed in an airy part of the garden, and kept shaded from the heat of the sun, and moderately moist, but never very wet. As soon as the young plants appear with six leaves, and become about threè inches high, they should be planted out on a bed of good rich garden mould, at about ten or twelve inches distance, and be defended from excess of rain and severe frosts, by mats on hoops, placed over the bed in the usual manner : they will, in general, blow the following summer, but not more than one plant out of a hundred seedlings may be expected to produce flowers of a fine quality. Hogg says, if a florist raises six new Carnations in his lifetime, he may be considered fortunate.

When increased by layers, the time for performing this operation is when the plants are in full bloom. The plant should be placed in the sun, so that it may become dry and pliable before the layers are bent down, as when they are too full of moisture

the branches frequently snap off at the joints : the layers are prepared by cutting off their lower leaves, and an incision is made by entering a quarter of an inch below the joint, and passing the knife up through the centre of it : it is then placed on the earth of the pot, which should be first stirred up ; and after it is properly pegged down, the branch should be covered with a good light but rich earth, about half an inch in depth.

When the layers are properly rooted, which will be the case with most sorts in about three weeks or a month after laying down, provided due care be taken to keep them regularly moist, and to shade them from the heat of the meridian sun, they are then to be cut off from the old plant, with about half of an inch of the stalk which connects them with it, and be immediately planted in small pots, three or four plants in each, placed round the sides. The pots are to be placed under an arch of hoops, where they can be covered with mats, in case of excessive rains, till the severity of the weather renders it necessary to remove them into their winter repository.

The propagation of Carnations by pipings is very precarious. Maddock says, “ Five thousand plants were piped one season, of which not more than one hundred perished, whereas more than two thousand were lost of the same number the year

following, with but very little variation in the management ; nevertheless, some sorts succeed much better by piping than laying, and make healthier plants : it requires attention and experience to distinguish such sorts from the rest." Where shoots are too short for laying, or where they become broken by accident, it is necessary to have recourse to piping ; and for this purpose it is essential to have a slight hotbed, and cover it four or five inches deep with fine light mould, laid very regular and even. " The cuttings intended to be piped are to have two complete joints, that is to say, they are to be cut off horizontally close under the second joint : the extremities or points of the leaves are likewise to be shortened, as for laying, which will leave the whole length of the piping from one inch and a half to two inches, according to its strength : as soon as thus prepared, it may be thrown into a basin of soft water for a few minutes, to plump it up. The earth on the bed where the pipings are to be placed should be moderately moistened, and rendered rather compact than otherwise ; then take a small hand-glass, and with it make an impression neatly on the surface of the soil, in order to know where to stick in the pipings, so as to lose no room, or endanger their being disturbed when the glass is placed over them. The pipings are then to be taken out of the basin singly,

and forced into the earth, in their wet state, with a steady hand, but not more than half an inch deep. When a sufficient number for the glass are thus placed regularly at equal distances from each other, and rather more than an inch within the mark described by the glass, on every side, they are to be very gently watered, in order that the earth may adhere more closely to them, and thereby keep out the air; after this watering, they are to remain open, but not exposed to a hot sun till their leaves become perfectly dry, after which the glass is to be placed over them carefully on the same mark that was made by it upon the surface of the soil. The bottom edges of the glass are to be forced a little into the earth to prevent the admission of too much air. The soil should be kept regularly moist till they have formed their fibres: but too much moisture is as prejudicial as too little; and whenever they are watered, the glasses are never to be replaced over them till their leaves are perfectly dry. The pipings should have a little of the morning sun, but must be shaded from it when the heat becomes considerable; this will be easily effected by placing mats upon a slight frame of hoops or laths erected over the bed about two feet above it.

“ The glasses should be occasionally taken off to admit fresh air; if this material point is neglected, the consequence will be a green mossy ap-

pearance on the surface of the earth, and a universal mouldiness amongst the plants, which will destroy them. It requires more skill to know when and how long the pipings should be exposed to the air, while forming root, than for almost any other part of the management ; on this single point, in great measure, depends the good or ill success of the whole undertaking.

“ There is no great danger in taking off the glasses for a few minutes or half an hour, when it is cloudy, and the air rather warm and moist ; but if no opportunity of this kind occur in due time it should be done early in the morning, and rather than omit doing it entirely, it will be better to take the glasses off, if it is only for five minutes, turning them upside down upon the path, in order to air them, and replacing them again over the plants : even this will be of great service, though not equal to a more effectual airing at favourable times, which, indeed, becomes more frequently necessary in proportion to the length of time the pipings have been upon the bed ; but when once they begin to strike fibre, they will soon spindle up and become extremely weak, if not carefully attended to agreeably to the following directions : when their fibres are formed, which the additional verdure and growth of the plants will demonstrate, the glasses should be placed over them very lightly, in order

that more air may be admitted, and when they become tolerably well rooted, the glasses being no longer necessary, should be entirely taken away ; but it seldom happens that all the plants, under the same glass, strike root together : some are generally a few days or a week forwarder than the rest, as will be apparent by their superior growth and verdure ; such ought to be carefully taken up and planted in a small pot, for winter preservation, or they may be planted round the sides of large Carnation pots, filled with the compost, where they will soon make rapid progress : the remaining plants which are not sufficiently rooted for removal, must be continued under the glasses, as before directed, till they become so."—*Flo. Direct.*

Mr. Hogg considers that piping should commence sooner than laying, before the shoots get hard and woody ; he begins about the first of July. Plants raised from pipings he considers as sounder, and more likely to encounter the rigours of a sharp winter, than layers.

The pots recommended by Maddock for flowering plants, should be at least twelve inches wide at the top, six inches at the bottom, and ten inches deep in the inside. Hogg uses pots of twelve or sixteen to the cast, being smaller than those recommended by Maddock.

According to the advice of Maddock, " the pot-

ting should commence about the middle of March, if the weather is not extremely unfavourable; but it should not, on any account, be deferred later than the end of that month. The pot is, in the first place, to be half filled with compost, having an oyster-shell, with its hollow side downwards, placed over the hole in the centre of the bottom: this compost is to be higher at the sides than in the centre of the pot; and the plants intended for it, which are supposed to have been wintered in small pots, containing four plants each, are to be carefully turned out of their pots, with all the earth adhering to them, in a ball; and after rubbing off about half an inch of the surface of the old mould, round about the plants, above their fibres, cleaning them and cutting off the decayed points of their leaves, the ball is to be carefully placed in the centre of the pot, and the space between it and the sides filled up with the prepared compost.

" It is very necessary to be attentive in placing the plants, that they be neither planted deeper nor shallower than they were before; the compost should therefore be high enough to replace the old earth that was rubbed off on potting, exactly to the same height as before, *i. e.*, half an inch higher than the ball of old earth and fibres, and the whole surface of the earth in the pot, when the operation is finished, should be nearly level or flat; but by

no means higher in the centre than the sides, because the plants would thereby be kept too dry ; nor should the compost come nearer than within an inch of the top or rim of the pot, after it has been gently shaken, or struck against the ground on finishing, as an inconvenience will attend its being too full, when the operation of laying comes to be performed, which requires some additional mould on the surface, for the layers to strike into."

When the plants are thus potted off for bloom, the pots should be placed in an open airy part of the garden, under a frame of small iron rods or hoops, that they may be covered with mats in case of frosty nights or heavy rains, but at all other times they should be kept open to the air, and frequently watered with soft water from a fine-rosed watering-pot, giving them more frequent waterings just as they begin to flower, paying at the same time attention to the flower-stems as they advance, which must be supported with small sticks, to prevent their being broken by the wind.

The pots of Carnations should not be housed too early, as the first frosts of the autumn are not so dangerous to them as those of the spring, after they have become tender by housing ; and during the winter the waterings should be very moderate. Those who have spare frames may protect them as recommended for the Auriculas.

The Clove Pink and the Picotée Carnation, being of a hardier nature than other Carnations, are able to stand the frost of moderate winters, and are therefore desirable for the open garden ; but even these we should recommend to be planted in clumps of eight or ten plants each, as, in case of excessive rains or very severe frosts, they may be easily protected by a slight frame formed of poles, and covered with mats.

Carnations when in flower are generally displayed on stages ; but as our object is more to embellish the flower-garden than the stage, we recommend that when the plants are in flower the pots should be disposed in clumps in such parts of the borders as may shew them to the best advantage, and at the same time where other plants will hide the sight of the pots. By this means many spots may be enlivened where the earlier flowers have altogether disappeared, and more particularly in situations near the windows of the dwelling, or contiguous to the walks of the principal entrance, as their fragrance is of too agreeable a nature to be wasted in solitary parts of the garden but seldom visited,—for the Carnation seems a flower

Not to delight thine eye alone design'd,
But touch, and calm, and elevate the mind.

PEONY. *Paeonia.*

Natural Order *Multisiliqua.* *Ranunculaceæ*, Juss.,
 (but now removed to the family *Helleborus* by the
 French Botanists.) A Genus of the *Polyandria Di-*
gynia Class.

There might ye see the Piony spread wide.

COWPER.

THE glowing grandeur of this flower, which is so attractive in our rustic gardens, seems to make it reign empress over the floral tribe of humble parterres, and to possess a kind of dignity which almost forbids the youthful hand to pluck it; yet how few of the young admirers of nature's gayest works have not desired to possess a full-blown Peony to embellish their juvenile garden.

Scenes of my youth ! ye stand array'd
 In thought before my longing eye—
 In all the change of sun and shade
 I see the vision'd landscape lie ;

The verdure of the ancient grove—
 The quiet old paternal hall—
 The hoary oaks that stood above
 The dim secluded waterfall.

The Retrospect.

In the emblematical language of flowers, the

Peony is given as a representative of bashful shame.

Antiquity celebrates the virtues of this plant, and places it amongst the wonders of the vegetable creation. Fable gives us its origin, *Aesculapius* its properties, and superstition ranks it amongst miraculous plants, assuring us that demons will fly the spot where it is planted, and that even a small piece of the root worn round the neck is sufficient to protect the wearer from all kinds of enchantment.

It owes its name to *Paeon*, a famous physician of antiquity, who is said to have cured the wounds which the gods received during the Trojan war, with the aid of this plant; and from him skilful physicians are sometimes called *Paeonii*, and, on the same account, those herbs which are serviceable in medicine, *Paeoniae herbae*.

The ancient writers, who transformed simple facts into fabulous histories, for the purpose of deifying favourite mortals, relate that *Paeon*, who was a pupil of the great *Aesculapius*, first received the Peony on Mount Olympus, from the hands of the mother of Apollo, with which he cured Pluto of a wound he had received from Hercules; but this cure created so much jealousy in the breast of *Aesculapius*, that he secretly caused the death of *Paeon*. Pluto, however, retaining a grateful sense of his service, changed him into this flower, which ever after bore

his name,—except amongst the Italians and Spaniards of modern days, who, in defiance of antiquity, have presumed to name it Mountain-Rose, because it grows naturally in the mountainous parts of their countries, the Italian name being *Rosa de' monti*, and the Spanish, *Rosa del monte*.

The Hortus Kewensis notices ten distinct species of Peonies, besides varieties; and the Dutch catalogues of the present day enumerate no less than twenty-three different species and varieties of this grand flower.

England claims one species, *corallina*, entire-leaved, as a native of her soil; and Gerard tells us that it grew wild in his day on a rabbit warren, in the parish of Southfleet, in Kent. This was called the male Peony, and is the kind of which the root has been so highly extolled in medical works.

The superb Double Crimson Peony of our gardens, *officinalis*, is a native of the mountains of Switzerland, as also of the Alps, from whence it has long been brought to decorate our parterres, as it is mentioned by our oldest writers on plants.

Gerard observes, in his time, that we had not obtained the Double White Peony, but he adds, “We do expect it from the lowe countries of Flaunders.”

The same species of Peony is found to vary much in different countries, that of Portugal having an agreeable sweet scent.

The White-flowered Peony, *albiflora*, has also an agreeable fragrance, like that of the Narcissus. This species is a native of Siberia, and is well known to the Daurians and Mongols, who boil the root in their soup, and grind the seeds to put into their tea ; these people call it *Dochina*, and the Russians, *Marjin koren bjelye* : this species was first introduced in 1784.

The common Peony of the garden will grow in almost any soil and situation, and will thrive under the shades of trees, which renders it a most valuable plant for ornamental shrubberies ; and it is observed that the duration of the flowers is considerably longer when thus shaded than when exposed to the full meridian sun : we therefore recommend them to be planted in situations open to the east, but sheltered by trees or shrubs from the south and western sun. These plants should not be often removed, as it injures their flowering ; but when it becomes necessary to transplant or divide the roots, it should be done about the end of August or the beginning of September : for if they are removed after their roots have shot out new fibres, it checks the plant, and prevents its giving fine flowers for the succeeding summer. The double varieties are increased by parting the roots, observing to preserve a bud upon the crown of each offset, or they will come to nothing ; and the roots should not be separated

too small, for when the offsets are weak they frequently do not produce flowers for several years, or, at best, but a single flower of diminutive size : now the beauty of this plant consists in the splendid size of the flowers ; and its effect, in congregating a considerable number in one spot.

It frequently happens that these blossoms are injured by the rain, which renders the flowers so heavy, that they fall to the ground, and become dirty and unsightly.

As full-blown Poppies, overcharged with rain,
Decline the head, and drooping kiss the plain.

POPE's Homer.

To prevent this, little stakes should be provided with a fork at the end, in which the stalk should rest just beneath the corolla, and the other end of the stake be forced into the ground to the proper height ; the foliage will hide the stick, and the plant will retain its natural elegant appearance, which it loses when tied to a support.

The single sorts are easily propagated by seed, which should be sown in the autumn, upon a bed of light fresh earth, covering them over with the same soil about half an inch in depth. In this bed they should remain two years before they are transplanted, observing to cover them with an additional inch of mould in the autumn. These were formerly much cultivated for medicinal purposes, and

even in modern practice there have been advocate for this root in some cases, particularly in that formidable disease the epilepsy, in the night-mare, vertigoes, and lethargy. It has been commended by some as a most efficacious remedy in obstructions of the liver ; and many extraordinary cases of this description have been recorded by respectable physicians, without alluding to curious accounts handed down from Galen and other ancient medical sources.

CHINESE TREE PEONY. *Paeonia Moutan.*

The Chinese have ever been celebrated for their love of flowers, and attention to the cultivation of plants; and it appears to have been the only country in the globe where this profitable and delightful employ has not met with serious interruption; since the gardens of China are, in all probability, older than those of Babylon, and other eastern parts of the world, which are passed away

Like the baseless fabric of a vision.

That we did not sooner possess the superb Tree Peony of China in the gardens of Europe, may be in a great measure owing to the vulgar prejudice which formerly existed, of treating all singular re-

lations as "travellers' stories," and believing only what one's own eyes had seen: otherwise, how are we to account for the long neglect in obtaining this and many other rare plants, which were made known and fully described to us as long back as the year 1656, when the first embassy which the Dutch East India Company made to China returned to Europe? The attendants of this embassy appear to have had freer access to that country than has been granted to any subsequent embassies that have been sent out; for we find they not only passed from Canton to Pekin, but visited and faithfully described every thing worthy of notice, and were even allowed to visit the gardens of the Emperor of China: yet this excellent work, which first made known that delightful fruit the Ananas, or Pine-Apple, the refreshing leaf of the Tea, and the magnificent flower of the *Moutan*, or Tree Peony, was so much neglected as a volume of "travellers' stories," that little account appears to have been made of its description of the vegetable kingdom, although it was translated into English, and published in London as long back as 1669; and from which we shall extract Niehoff's account of the Tree Peony, to show not only how faithfully it is described, but that inquiry must have been made as to what part of China it was indigenous.

This author says, under the head of flowers,

"There are several rare and well-scented flowers which grow in these parts, that [are unknown to those of Europe.

"In the province of Suchue (Suchew), near to Chungking (Chongking,) grow certain flowers called *Meutang* (*Moutan*), in high esteem amongst them, and therefore called the King of Flowers. It differs very little in fashion from the European Rose, but is much larger, and spreads its leaves further abroad: it far surpasses the Rose in beauty, but falls short in richness of scent: it has no thorns or prickles, is generally of a white colour, mingled with a little purple; yet there are some that are yellow and red. This flower grows upon a bush, and is carefully cherished and planted in all gardens belonging to the grandees, for one of the most choice flowers."

—Page 250.

Even after this description of the plant it remained unknown to Europe, until the late Sir Joseph Banks, whose mind had expanded itself beyond that of men in general, by travel and the study of nature, ever alive to benefiting the world by scattering its blessings and its beauties over the remotest quarters of the globe, gave instructions to several merchants trading to Canton, to inquire for the *Moutan*, the name by which the Peony is known in China: in consequence of these applications, numerous specimens were sent to this country

about the year 1789, but most of these plants perished in the voyage. About the year 1794, other plants were imported, and since that time the Tree Peony has frequently been brought from China in a growing state.

This favourite flower of the Mandarins is said to have been cultivated in China upwards of fourteen hundred years, yet the singular inhabitants of that ancient empire think so little of that period, as to consider it rather a plant of modern than of ancient introduction. The Chinese writers differ in their accounts with regard to the origin of this shrub, some attributing it to a particular process of culture, by which the common herbaceous Peony has been converted into this magnificent shrub, which is said to reach the height of eight or ten feet in the province of Loyang, where the soil and climate seem particularly favourable to the growth of this plant.

Some of the Chinese authors tell us, and perhaps with more correctness, that the Moutan was first discovered growing among the mountains in Northern China, whence it was brought into the southern provinces, and there cultivated with the same mania as Tulips have been in Europe, since we are told that some choice varieties of the Moutan have been sold in China for a hundred ounces of gold. It is propagated in China principally by seed, by which process such numerous kinds have been raised, that

they now enumerate no less than two hundred and forty species, as they call them, some of which are said to be of delightful fragrance.

The Tree Peony sold for high prices when first it got into the hands of the nurserymen in the vicinity of London, but it is already become moderate in price, since it has proved of easy cultivation, and a much hardier nature than was at first expected.

When these plants were first known in France, Monsieur Noisette, a nurseryman in Paris, sold them at from one thousand five hundred francs, to one hundred louis each.

The Tree Peony is now found to be sufficiently hardy to bear the cold of our climate ; but to have it in all the splendour which it is capable of displaying, the plant should be simply secured by a glazed building, the aid of artificial heat being unnecessary to its full development.

When the different varieties of these magnificent flowers are inoculated on the branches of a single plant, it is hardly possible to conceive a more splendid effect than it presents, in its fine lobed foliage and superb-sized flowers, whose colour varies from the finest carmine to the most delicate blush of the rose. The large petals, which are finely shaded off from the centre to the edges, are placed with the most graceful irregularity, and yet the whole forms a group of perfect symmetry and beauty.

This plant is already sufficiently inured to our climate to perfect its seed ; and we may therefore reasonably expect that we shall, in a few years, be able to raise varieties surpassing those of its native land,—as its early time of flowering, being from May to the end of June, gives the whole summer to ripen the fruit.

It is easily increased by layers and cuttings, as well as by parting the roots ; and may be treated in a similar manner to the Hydrangea, protecting it from the excessive heat of the mid-day sun, allowing it ample watering when in flower, and removing all superfluous buds before the principal flowers are expanded.

THRIFT OR SEA PINK. *Statice Armeria.*

Natural Order *Aggregatæ*. *Plumbagines*, Juss. A
Genus of the *Pentandria Pentagynia* Class.

Thrift ! Thrift ! Horatio.

Hamlet.

— Doth a garden, trimm'd and tortured by
Hands that can dext'rous wield the lopping knife,
Show lovelier than nature's free, wild grounds ?

G. BURGESS.

IN the days of our ancestors, when the flower parterre was divided into hearts and diamonds, and the garden was made to display octagons, hexagons, circles, and semi-circles, without number, the Thrift formed an important part in the necessary plants for this geometrical style of gardening.

It still figures away as a bordering to cottage-gardens, where we love to see this fast-expiring fashion preserved, since it brings to mind the early recollections of our juvenile horticultural pursuits, when to possess a few roots of Thrift, to divide and subdivide our little plot of ground, was a happiness that we refer to with pleasure in our riper years.

Even so the mind's inquiring eye . . .
Looks backward through the mist of years,
Where, in its vast variety,
The chequer'd map of life appears ;

And even where Hope's declining rays
Have ceased to paint the path before her,
The sunshine of her youthful days
Still casts a cheering influence o'er her.

The Retrospect.

This plant is slightly mentioned by Pliny under the name *Statice*, which seems derived from the Greek ($\Sigmaτατικην$) making to stop, as this plant, by its growing in sandy situations, is found to retain and stop the movement of the sands.

The English name of Thrift was most probably given to it from the rapid manner in which it propagates itself in the garden by its roots; but in this situation it is never known to increase by seed, although it springs so readily from seed in many situations on the coast: for although it is frequently found on the highest mountains of this island, its favourite soil seems to be a marine mud or ooze mixed with the shingles of the sea beach; and on this account, as well as from its grassy leaves, it is generally called Sea Pink. We have frequently seen it so abundantly on a little common between Lancing and Worthing, in Sussex, as to form a complete turf of green leaves in the winter, and enamelling the ground by a mass of pink flowers from the month of May until August, which formed a charming contrast with the blue ocean.

These plants improve in the size and often in

the colour of their flowers by cultivation ; and in such situations as require an edging plant to the borders are certainly preferable to the uniform appearance of the box edgings ; but the Thrift is still better calculated to form irregular masses on banks or in wilderness scenery, where its pink flowers create a charming effect when in large quantities.

In undulating lawns it may be employed with happy effect to cover the tops of some of the highest eminences, which will give an appearance of distance, whilst it adds to the beauty of the turf without injury to its neatness. These masses should be of an irregular shape, and carried over the risings, so that their extent may not be visible from the spot where they are principally to be viewed from.

In the time of Queen Elizabeth this plant was called Ladies' Cushion and Sea Gilloflower, as well as Thrift ; and was then much used for the borders and banks of gardens, for which purpose, says Gerard, " it serveth very fitly."

These plants are increased by parting the roots in the month of September or October, which requires to be done annually when planted in rich garden mould, as they are subject to rot and decay in such soil if permitted to stand long unremoved.

This flower should be viewed through a microscope to have its individual beauties duly appreciated. As it does not appear in the hieroglyphics of floral language, we have presumed, from its hardiness, and its resistance to the threatening storms and cutting blasts from the ocean, and the boisterous winds of the mountains, to make it the emblem of dauntlessness.

SWEET PEA, OR VETCHLING. *Lathyrus Odoratus.*

Natural Order *Papilionacei*, or *Leguminosæ*. A Genus of the *Diadelphia Decandria* Class.

Here are Sweet Peas on tiptoe for a flight,
With wings of gentle flush o'er delicate white,
And taper fingers catching at all things,
To bind them all about with tiny rings.

KEATS.

THE Sweet Pea, the emblem of delicate pleasures, was unknown in the British gardens until the first year of the eighteenth century, when it blossomed in the garden of Dr. Uvedale, at Enfield in Essex, who is supposed to have been the first cultivator of this favourite flower in England : it has since spread itself over the whole of Europe, entering every garden where the florist is disposed to

— lend a staff to the still gadding Pea.

Linnæus tells us that the common dark variety is a native of Sicily, and that the more delicate-coloured kind, which is distinguished by the name of the Painted Lady, is an indigenous plant of Ceylon. These two kinds have lately been blended by the

advances in height, which curls its tendril fingers around whatever it can meet with to support it from the earth, where, were it suffered to fall, the flower could scarcely perform the act of impregnation, from the want of sun and air ; and its leguminous fruit, could it be formed, would be devoured by insects before it could mature its seed, and what escaped their ravages would, were it to rest on the ground, be consumed by the birds, who cannot so easily open the pods whilst they are dangling in the air. Thus, under cultivation, we observe the common Peas of the field, which have no aid lent them, supporting each other in friendly embrace. Each plant clings to its neighbour whilst it offers its own arm in return for the support it borrows, until we find the whole field linked in that happy union which rears each individual plant from the cold ground, and supports their pods out of the reach of reptiles.

The Pea in its ripened state is also the food of numerous species of the larger kinds of animals, from the mouse of the fields to the noble horse of the plain ; and Nature seems to have guarded the parts of fructification with a precaution not less wonderful than the means she has given it to climb. In opening a pod of Peas, we sometimes find a small withered skin of a Pea or two, mixed with the perfect Peas, but more generally at the end of the pod.

These are mere empty shells that have not received a portion of the fecundating properties of the farina from the anthers, which is conveyed from the stigma by means of a sinewy tube on which each Pea is regularly placed ; for should any accident destroy the anthers or blow away the farina from them, the pods would then contain only empty shells which would wither away : but we see, with wondering admiration, that Nature has taken precautions adequate to the wants of the plant ; for, on dissecting the flower, the young pod with the stigma will be seen surrounded by the anther, the whole being enclosed by a beautiful folding of the lower petals, which is called the keel, from its form resembling the keel of a boat, and which opens just sufficiently to admit a necessary portion of air : this keel is protected by two other petals, which hang over it like a penthouse, by which name they are frequently called : the upper petal or standard shades the whole from the scorching rays of the sun, and at the same time acts as a vane to turn the flower with its back to the wind, so that the storms cannot reach the opening of the keel and injure the anthers. Thus in a fine day you may see a whole field of blossoms veer round to avoid the winds, with as much exactness as an artificial vane on a tower points out the quarter from whence the wind blows.

Sweet Peas have the best effect in the pleasure-

garden when planted so that they may climb to some tree or shrub which has flowered in the spring ; they convey the idea of their natural liberty, when so disposed that they

— catch the neighbouring shrub
With clasping tendrils, and invest his branch,
Else undorn'd, with many a gay festoon,
And fragrant chaplet, recompensing well
The strength they borrow with the grace they lend.

COWPER.

When thus disposed, the seeds should be planted in a circle round the stem, but at some considerable distance, as they may be guided to the trunk by means of sticks placed in a sloping direction from the plants to the tree ; for when planted too near the tree they will seldom thrive, from want of sufficient nourishment. Where this mode is objectionable, they may be sown in circular trenches, and at the proper season branching stakes may be placed in the centre for them to fix their tendrils on ; and thus trained, they will form a kind of Pea-tree, and exhibit a far more beautiful appearance than when planted in straight rows like pottage-peas in a kitchen-garden.

The time of sowing the Sweet Pea must, in some measure, be regulated by the weather, as well as by the nature of the soil, as where the earth is wet and cold it must, of necessity, be deferred longer than when growing in situations where it is light and warm.

We have generally observed that those which have been sown in February have been the most productive of flowers, although it is desirable to make a second sowing in March, and a third in April, so as to have a succession of these fragrant blossoms.

When sown in pots, the earth should be rather of a retentive nature than too light, and the pots should be of the deepest kind. October is a good time for this sowing; and when they are removed to the house, or placed under frames, to protect them from the frost, they will require more frequent waterings than most other housed plants.

EVERLASTING PEA. *Lathyrus Latifolius.*

This handsome native plant, having no place in the dictionary of floral language, we presume to place it there as the emblem of lasting pleasure, since we find it a perennial whose beautiful clusters of flowers are renewed every year, to give pleasure to the admirers of Flora's gifts.

Gerard calls it the "Tare Everlasting," and "Pease Everlasting, and Chickling." In the present day, when so few spots are left uncultivated in

this country, and those few so frequently deprived of their singular productions, that many indigenous plants are seldom met with, except under cultivation in the garden, we are induced to make frequent extracts from the old writers who have particularized the spots on which they formerly grew ; and of these authors none have been so faithful as Gerard, who is better entitled to the name of the English Pliny than any author from his time to the present day. This vegetable historian, speaking of the Everlasting Pea, says, “ This plant doth grow in shadowie woods, and among bushes ; there groweth great store thereof in Swanesccombe-woode, a mile and a halfe from Green-hithe, in Kent, as you go to a village thereby called Betsome, and in divers other places.” Mr. Ray observed it about the middle of the last century, in the Cambridgeshire woods ; and Martyn tells us that it has also been found at Rocks, near Red Neese, by Whitehaven, Severn Stoke Copse, Worcestershire, &c. It is also found in various parts of the South of France.

This plant is too large and rambling for the flower border, but it forms a splendid ornament in the shrubbery or wilderness walks, where, by covering the bare trunks of trees with its clusters of rose-coloured flowers, it adds greatly to the cheerfulness of these scenes from the middle of June to the end of July. Where walls or other fences are

covered with ivy, this pea mixes with its gloomy leaves with a happy effect. We are not aware whether it has ever been cultivated by the agriculturist, but as it is perennial, and yields a great quantity of green fodder, the experiment may be worth the trial. We will venture to promise that the seeds will be acceptable to the farmer's pigeons and the landlord's game, whilst its flowers will materially assist to fill the comb of the cottager's hives, even if it be no further cultivated than for decorating the common hedge-rows, where its bunches of papilionaceous flowers could not fail to delight the passenger by their gay tints. These Peas may be sown either in the autumn or the spring, and the plants will bear removing.

TANGIER PEA. *Lathyrus Tingitanus.*

This plant, whose name pronounces it a native of Barbary, is an annual flower that has been an inmate in our gardens since the year 1680; but as it is greatly inferior to the Sweet Pea in point of beauty, we shall merely notice it on account of the velvet-like petals of its small but richly-coloured corolla.

LUPINE. *Lupinus.*

Natural Order *Papilionaceæ*, or *Leguminosæ*. A Genus
of the *Diadelphia Decandria* Class.

— *Tristisque Lupini*
Sustuleris fragiles calamos.

VIRGIL.

— Where stalks of Lupines grew,
Th' ensuing season, in return, may bear
The bearded product of the golden year.

DRYDEN. :

THE Lupine, which we cherish in our gardens as an ornament to the parterre, formed an important article in the husbandry of the Romans, who cultivated it not only as a subsistence for their cattle, but as a food for themselves also. Pliny says, he could not recommend any diet that is more wholesome and lighter of digestion, than the White Lupines, when eaten dry. Their bitterness was taken off by soaking them in hot water, or covering them with hot ashes. The same author says, that this food gave those who ate it generally with their meals, a fresh colour and a cheerful countenance.

We learn from Columella, that Lupines were sometimes flavoured with a Syrian root, and so eaten to provoke drinking, or perhaps to give a

relish to the Egyptian beer, as our country people introduce cheese.

— That root
Which comes of Syrian seed, which sliced is given
With moist'ned Lupines join'd, that it may
Provok fresh bumpers of Pelusian beer.

Lub. 10.

The eating of Lupines was also thought to brighten the mind, and quicken the imagination. It is related of Protogenes, a celebrated painter of Rhodes, who flourished about three hundred and twenty-eight years before Christ, that, during the seven years he was employed in painting the hunting-piece of Jalysus, who was supposed to be the founder of the state of Rhodes, he lived entirely upon Lupines and water, with an idea that this aliment would give him greater flights of fancy. It was in this picture that he wished to introduce a dog panting, with foam at his mouth; but not succeeding to his satisfaction, he threw his sponge upon the painting in a fit of anger, when chance brought to perfection what the utmost of his art could not accomplish, for the sponge falling on the wet paint that was intended to represent the foam, gave it so much the appearance of reality, that the piece was universally admired.

We shall relate another anecdote of this Lupine-eating painter, to show in what reverence the artists were held in those early days.

When Demetrius besieged Rhodes, he refused to set fire to a part of the city, which might have made him master of the whole, because he knew that Protogenes was then working in that quarter. When the town was taken, the painter was found closely employed in a garden, finishing a picture; and upon being asked by the conqueror why he showed not more concern at the general calamity, he replied, that Demetrius made war against the Rhodians, and not against the fine arts.

The Lupine is a plant that loves a poor light sandy soil, and it was much employed by the Romans as a manure for such situations, being ploughed or dug into the ground just as it began to blossom. It formed the principal manure for many vineyards and orchards where animal dung could not be procured. Cato recommends the haulm of Lupines, amongst other vegetable substances, to form a compost for vines that were decaying. It is remarked by Pliny, that the Lupine was sowed with less expense to the husbandman than any other seed, since it was merely scattered on the ground amongst the bushes or briers without either ploughing or digging, and that the seed readily took root without being covered with earth.

Mr. Swinburn observes, that Lupines are still sown in the neighbourhood of Naples to manure

the land, which are hoed up before they fructify. This is also practised in the south of France in poor dry soils, as a meliorating crop to be ploughed in, where no manure is to be had, and the ground is too poor for clover and other better crops.

The ancients named this plant *Lupinus*, from *Lupus*, a wolf, on account of its voracious nature. When this pulse was eaten without preparation to destroy the bitter, it was apt to contract the muscles, and give a sorrowful appearance to the countenance—hence Virgil calls it *Tristes Lupinus*.

The name of *Lupinus* is of great antiquity; and the seeds are said to have been used by the ancients, in their plays and comedies, instead of pieces of money: hence the proverb, *Nummus Lupinus*, a piece of money of no value; as also that of Horace—

Nec tamen ignorat, quid distent Aera Lupinis.

The French call this plant *Le Lupin*, the Italians *Lupino*, the Spaniards *Entramocos*, and the Germans *Feigbonen*, Fig-bean.

Lupines have long possessed a place in our gardens, since they appear to have been common in the time of Gerard; but they scarcely deserve a situation amongst choice flowers, and we should therefore recommend them to the shrubbery, where the Yellow Lupine, *Luteus*, is acceptable, on ac-

count of its fragrance, which is similar to that of Cowslips. This species is a native of Sicily and Silesia. The small blue Lupine, *Varia*, is a native of the south of Europe, and the large blue-flowered *Hirsutus*, which is first noticed by Parkinson, in 1629, is also thought to be a native of the same parts, although Linnaeus mentions it as indigenous to Arabia, and the islands of the Archipelago, whilst Miller considered it an aboriginal of India; and Parkinson reports that it was said to have come from beyond Persia.

The Rose Lupine, *Pilosus*, which produces a flesh-coloured flower, is also a native of the south of Europe, from whence it was introduced in 1710.

We have procured four different species of this plant from America, one of which is perennial: this was brought from Virginia in 1658.

To procure a succession of these flowers, they should be sown at three different seasons, that is, in April, May, and June. The best mode of sowing them is by forming small clumps of them; but they should not be sown too thick, and they seldom succeed when transplanted. The Lupine has a leaf that is termed *digitate*, which, at night, has the sides contracted, and hang down, bending back to the petiole.

The Lupine appears not to have been familiar to the inhabitants of eastern countries, and hence it

is not placed in their language of flowers: we have, therefore, agreeable to its name, and with due submission to the learned students of hieroglyphics, made it the emblem of voraciousness.

LARKSPUR. *Delphinium*

Natural Order *Multisiliquæ*. *Ranunculaceæ*, Juss. A Genus of the *Polyandria Trigynia* Class.

THAT a flower of so much celebrity for its elegance of shape and beautiful variety of colouring should be suffered to pass unnoticed by English bards cannot escape "our special wonder." Let no poet henceforth complain of the want of a subject until we are able to present our readers with a head to the history of a plant whose pyramidal bouquets rank in the parterre amongst the most brilliant favourites of Flora.

The lively and delicate dyes of these blossoms give a prismatic effect to the garden by their spiral branches of azure, rose, white, violet, lilac, and carnation hues.

In floral language the Larkspur is made the emblem of lightness, an appellation which the graceful airiness with which these flowers are placed on the branches truly justifies. The generic name of the plant is derived from the Greek $\Delta\lambda\phi\imath\nu\imath\nu\imath\nu$, signifying a dolphin, because the flower-buds, before they are expanded, are thought to resemble that

fish. In the natural single state of this flower, the outer petals form a kind of horn-shaped nectary at the back of the corolla, which is similar to the spur of the Lark's-foot, hence the name of Larkspur and Lark's-heel in English; and *Pied-d'alouette* in French: in the latter language it is also called *Eperon de chevalier*, Knight's-spur, which corresponds with the Italian name of *Sperone di cavaliere*. The Italians also honour it by the name of *Fior regio*, King-flower.

Gerard mentions the Larkspur amongst the flowers which were cultivated in the reign of Queen Elizabeth, but he does not seem to have been acquainted with this flower in its double state, for it was not until about the beginning of the seventeenth century that double flowers were so eagerly sought after; and it appears to have been about that period, when the florimania raged to such an excess among the Dutch, that the Larkspur had its petals multiplied to the exclusion of its spur, as we find it noticed by Parkinson, in 1629, who speaks of the great varieties of colours in these double flowers, and notices the loss of the spur when the petals become double. On this account the double varieties should be called after the generic name only, as Lark's-spur is unappropriate when the spur is not retained. The Delphinium, although it loses its spur by the increase of its

petals, yet retains an advantage over the Double Stock, and many other flowers which lose their parts of fructification when their petals are multiplied, for the *Delphinium* retains its anthers and stigmas, and consequently produces seed; but if this seed be suffered to sow itself in the autumn, it generally returns to its natural single state, whilst the seed that is kept dry, and sown later in the season or in the spring, produces double flowers. This species of Upright Larkspur, *Delphinium Ajacis*, is a native of Switzerland, but in late times it has been found growing spontaneously in several parts of the south of Europe; it is generally thought to have escaped from neighbouring gardens.

The seeds of the different-coloured varieties should be kept distinct, as this affords an opportunity of raising clumps of separate colours, which give a pleasing effect; yet we recommend some patches to be sown with all the colours mixed. We have frequently admired them in the Royal gardens of France when thus mixed; and this flower is more attended to in that country than with us. These plants send down long fibres, and therefore will not bear transplanting; but they may be suffered to stand thicker on the ground than the Branching Larkspur, *Delphinium Consolida*, which spreads its branches to some distance, so that four or five

of these latter plants are sufficient to form a group. These must never be mixed with the former species, as the character of the plants, and their duration of flowering, are so different; the latter, although less ornamental, continuing in flower for a longer period. This last species grows wild in most parts of Europe, as well as in England. Gerard observes that it grows in fields where corn has grown. It appears to have been principally found in Cambridgeshire.

The Great-flowered Larkspur, *Delphinium Grandiflorum*, is a Siberian perennial plant, the seeds of which were first sent to this country by Dr. Ammann, of Petersburg, to Mr. Miller, who cultivated it at Chelsea, in the year 1758. This plant is now propagated in a double state, and forms one of the most splendid ornaments of the garden by the brilliancy of its azure colour.

Mr. Miller had two years previously received, from the same gentleman, seeds of the Palmated Bee Larkspur, *Delphinium Intermedium*; also a perennial plant of great beauty, growing from five to six feet in height, and producing flowers of a most resplendent blue. This species proves to be a native of Silesia, although some botanists have considered it only a variety of the Siberian common Bee Larkspur, *Elatum*, which also grows to the height of six feet, flowering from June to September, with fine deep-blue corollas. This last kind

is a much older plant in our gardens. Siberia has also furnished us with the Scarlet-flowered Larkspur, *Puniceum*, and we have procured three species of *Delphinium* from America.

The Siberian and the Silesian Larkspurs have a fine effect in the vase of the saloon, where they retain their beauty longer in water than flowers in general. We shall therefore recommend them to the notice of the fair, as being deserving of both the pen of the poet and the pencil of the painter. Van Ost has been most happy in displaying the vivid tints of these flowers on canvass, and they contribute greatly to the beauty of his brilliant groups.

LARGE-FLOWERED ST. JOHN'S-WORT.
Hypericum Calycinum.

Natural Order *Rotaceæ*. *Hyperica*, Juss. A Genus
of the *Polyadelphia Polyandria* Class.

Hypericum all bloom.

COWPER.

I hold you as a thing enskied and sainted.

SHAKSPEARE.

WE possess no fewer than thirty-nine species and several varieties of the *Hypericum*, which modern bigotry has named St. John's-Wort, and which ancient superstition called *Fugu Demonum*, believing that this plant would defend persons from phantoms and spectres, and drive away devils. For the same reason others called it *Sol Terrestris*, Terrestrial Sun, because they say that all the spirits of darkness vanish at the approach of the sun. We are disposed to adopt the latter name to distinguish this flower from its thirty-eight relatives, as thirty-nine Worts are too many to dedicate to any one saint; and the *Hypericum Calycinum*, growing close to the earth, with a large yellow flower, whose hundreds of chives form so many

rays, certainly gives a better picture of the sun than it does of Aaron's beard, by which name it is frequently called.

The leaves of some of the species of this plant, when held against the light, seem perforated by a thousand small holes ; and hence it has been called *Perforata*, or *Porosa*, from which the French name for this genus of plants of *Mille-pertuis*, Thousand holes, is derived.

This Terrestrial Sun, which now shines so happily under the shade of the trees and shrubs of our pleasure-grounds, from the month of June to September, is a native of the country near Constantinople, from whence it was introduced to illuminate the banks of our shrubberies by Sir George Wheeler, in the year 1676. We are not told what use the fair Sultanas make of this flower in their emblematical language, and rather than it should remain a cypher amongst floral hieroglyphics, we place it in the Dictionary to represent superstition.

The *Hypericum Calycinum* has many qualities to recommend it to the notice of modern gardeners. Its being an evergreen creeper with large foliage renders it a desirable plant to cover banks and bare patches beneath trees, since, like the Periwinkle, it prospers in the shade, where its fine yellow petals and beautiful chives, headed by spark-

like anthers, remind us of small wheel-fireworks, and form a happy contrast to the azure flowers of the *Vinca*. It is easily increased by its creeping roots, and is sufficiently hardy to bear the rigour of our severest winters.

CRIMSON MONARDA. *Monarda Fistulosa.*

Natural Order *Verticillatae*. *Labiatæ*, Juss. A Genus of the *Diandria Monogynia* Class.

We are indebted to the New World for all the species of this genus of plants, of which we now possess seven. It is named Monarda from Nic. Monarda, or Monardes, a physician of Seville, who flourished in the sixteenth century.

We are not able to ascertain whether this plant was known in Spain so early as the sixteenth century; but the *Fistulosa*, with purple flowers, was the first species known in England, and was introduced in the year 1656, by Mr. John Tradescant, jun.; whether he obtained it direct from Canada, where it is a native, we are uncertain. The Crimson-flowered Monarda is a variety of the *Fistulosa*, and was first obtained from the Dutch florists by Messrs. Grimwood and Co., of Kensington, about the year 1790. This beautiful plant recommends itself to our notice by the fragrance of its foliage, as well as by its tufts of beautiful crimson flowers, which crown every branch, from the month of June to the end of August.

The stalks and foliage of this plant resemble that of mint, excepting that the centre rib of the leaves is of a fine crimson, and the circle of leaves which supports the flowers are beautifully shaded with a colour between that of the amethyst stone and the garnet.

This plant, which we particularly recommend to be placed in the foreground of the shrubbery, on account of the beautiful contrast which its rich dyes make with the green foliage of the laurel and other shrubs, loves a soft loamy soil, not too much exposed to the meridian sun. It is easily propagated by seed, which should be sown in the autumn, and it is also increased by parting the roots like mint or balm; if the branches are pegged down in the manner of layers, it will also take root. It is desirable not to let young plants flower the first year, as by cutting down the flowering stalks the roots become greatly strengthened for succeeding seasons.

The Crimson Monarda will keep fresh for a great length of time in water, ornamenting the vase and perfuming the apartment by a refreshing odour; we therefore give it as the emblem of steady virtue.

The Scarlet Monarda, or Oswego Tea, *Monarda Didyma*, was introduced from North America by Mr. Peter Collinson, in the year 1744. This

plant has a most refreshing fragrance, and many persons prefer the infusion of the leaves to the tea of China. It is the common beverage of many families of Oswego, a town in New York; and hence it is called the Oswego Tea.

BELL-FLOWER. *Campanula.*

Natural Order *Campanaceæ*. *Campanulaceæ*, Juss. A
Genus of the *Pentandria Monogynia* Class.

The humming bees, that hunt the golden dew,
In summer's heat on tops of flowers feed,
And creep within their Bells to suck the balmy seed.

DRYDEN.

THE name of *Campanula*, which signifies a little Bell, has been given to this numerous family of plants, from the resemblance which the corollas bear to that instrument; and were we to describe all the species, sub-species, varieties, and sub-varieties of the *Campanula*, we should have to ring nearly as many changes as are performed on the celebrated bells of Saint Martin's tower. But as these changes might not be so agreeable to our readers as the sound of the merry bells were to the ears of Nell Gwynn, we shall merely touch upon those *Campanulas* that accord best with the harmony of the garden, regretting at the same time that the poets have not chimed either on the Coventry or the Canterbury bells, so as to have enlivened our passages in the history of these flowers. Milton slightly touches on the Bell-flower in his poem "On the

Death of Damon;" and as every touch of our sublime poet sounds harmoniously to the ear, we shall give the lines which he puts into the mouth of Thyrsis :

How often have I said, (but thou hadst found
Ere then thy dark cold lodgment under ground,)

There thou shalt cull me Simples, and shalt teach
Thy friend the name and healing pow'rs of each,
From the tall Blue-Bell to the dwarfish weed,
What the dry land, and what the marshes breed ;
For all their kinds alike to thee are known,
And the whole art of Galen is thy own.
Ah, perish Galen's art, and wither'd be
The useless herbs that gave not health to thee !

To resume our history, according to the rules of ringing, we must commence with the minor Campanula,—an elegant little plant, which suspends its graceful Bells on such slender supports that they bend with the slightest touch of a fly, and shake with the zephyr's gentlest breath.

THE PEACH-LEAVED BELL-FLOWER, *Campanula Persicifolia,*

Which is frequently called the Paper-Flower, from the delicate yet stiff texture of the corollas, ranks amongst the most ancient ornaments of our parterres. Gerard says, in 1597, " It is planted in

our gardens, but does not grow wild in England." *Le Bon Jardinier* mentions it as a native of France. About the middle of the last century this flower was first cultivated in its double state, and since that time it has deservedly attracted the attention of all good florists; for, although we lose the graceful bell-shape of the flower in its double state, its cylindrical stalks of snowy or azure rosette flowers form most beautiful bouquets, from the end of June to the beginning of September. This plant loves a light and fresh loamy soil, and a sunny exposure. It is propagated by dividing the roots in autumn. The French call this plant *Campanule des Jardins* and *Campanule à feuilles de Pêcher*, the Italians *Campanella*.

CANTERBURY-BELL. *Campanula Medium.*

This plant is no longer ranked amongst the aborigines of our soil, although Gerard tells us that "It do growe very plentifully in the lowe woods and hedgerowes of Kent, about Canterbury, Sittingborne, Southfleete, and Greenehyth," and many other places which he mentions. In his age it bore, in addition to the name of Canterbury-Bell, those of "Haskewoort, Throtewoort, and Vuula Woort,"

from the virtues it was thought to possess in curing swellings and inflammations of the throat. Of this species there are varieties with blue, purple, white, and striped flowers, both single and double. It is biennial, and decays after having matured its seed.

The Canterbury-Bell is raised by sowing the seed on a common border, in the spring of the year; and it should be transplanted when of a proper size into other beds, and in the autumn it may be removed to the spots where it is intended to flower the following year. These flowers are large and branching, and therefore better calculated to embellish the shrubbery than to mix in the borders of choice flowers.

The French distinguish this species by the name of *La Cloche*, Bell, *La Clochette*, Little Bell, and *Les Gants de Notre Dame*, Our Lady's Gloves.

PYRAMIDAL BELL-FLOWER, *Campanula Pyramidalis*.

This plant, as its name intimates, bears its bells on tall pyramidal branches, rising from the flower border like a Chinese pagoda amongst more humble buildings. It is a magnificent plant when in full flower, and is frequently employed by country

people to decorate their windows, as it is sufficiently pliable to accommodate itself to any shape; sometimes bending its branches round a hoop, forming a complete circle; at others, taking a fan shape, so as to serve as a blind either to the window, or to the rustic grate of a country parlour.

So did the maidens, with their various flowers
Decke up their windows, and make neat their bowers.

We have sometimes seen its branches trained over hoops so as to form a complete globe, which is an ingenious device; but nature has formed this rustic plant so peculiarly graceful, that to attempt to mend it is only to add deformity. This species is biannual, and grows naturally in some parts of France, Savoy, and Carniola.

It was cultivated in our gardens in the time of Gerard, who calls it "Steeple Milkie Bell-Flower," on account of the milky nature of the juice of the branches and roots, and not from the colour of its bells, which are generally blue, although a variety sometimes occurs with white flowers. This plant is usually increased by offsets, but those raised from seed produce the tallest plants, and give the greatest number of flowers. The seed should be sown in the autumn in pots or boxes filled with light undunged earth, and placed in the open air until the frost or hard rains come on, when they should be removed under cover of a frame, always

giving them free air when the weather will admit. The young plants will appear in the spring, when the pots should be placed in a warm situation until the summer, at which time they should be situated so as to receive only the morning sun. About September they may be transplanted into a border of light sandy soil, without a mixture of dung, which is fatal to these plants, as is too much moisture. These plants will require the protection of hoops, covered with oiled paper or matting, to screen them from severe frosts. In this bed they are to remain two years before being planted for flowering.

The Campanula is made the emblem of gratitude.

VENUS'S LOOKING-GLASS. *Campanula Speculum.*

The brilliant corollas of this little plant, which seem to reflect the rays of the sun, have gained it the name of Venus's Looking-glass, although some think this title was bestowed on it on account of the glossy nature of its seed.

It is made the emblem of reflection as well as of flattery. The flower varies, in colour, from a fine violet to a blue, and sometimes a white. Towards

the evening the corollas fold up into a pentagonal figure, enclosing the parts of fructification, and securing them from damp air until they are again opened by the rays of Aurora. From the shape of the flowers when thus folded, it has sometimes borne the name of *Viola Pentagonia*.

This plant grows naturally amongst the corn in most of the southern countries of Europe; and Gerard tells us, "I found it in a field among the corne by Greenhithe, as I went from thence toward Dartford in Kent, and in many other places thereabout, but not elsewhere: from whence I brought of the seedes for my garden, where they come vp of themselves from ycere to yeere by falling of the seede."

This annual plant is a great ornament to the parterre, particularly when sown in large patches on sloping banks. It seldom raises itself higher than from six to twelve inches; but, as its spreading branches completely cover the earth, it presents a mass of beauty by its mirrors, not exceeded by any of the humble plants which expand their petals to the sun of summer.

The shining seed should be sown in the autumn on a dry soil to produce early flowers, and the spring sowing will succeed them, so as to prolong the enjoyment of these agreeable little flatterers.

COLUMBINE. *Aquilegia.*

Natural Order *Multisiliquæ* or *Corniculatae*. *Ranunculaceæ*, Juss. A Genus of the *Polyandria Pentagynia* Class.

Bring hether the Pincke and Purple Cullambine.

SPENSER.

— And intwine
The White, the Blewe, the Flesh-like Columbines.

W. BROWNE.

THIS gracefully rustic flower, which forms a principal ornament to most of our village gardens, is a native of our sylvan scenes, being principally found in the open spaces of our forests or large woods.

It has been made the emblem of folly, but whether on account of the party-colour which it frequently takes in the garden, or in allusion to the shape of the nectary, which turns over like the caps of the old jesters, and those which the painters give to Folly, we are left to surmise.

This is Folly, Childhood's guide,
This is Childhood at her side.

HAWKESWORTH.

Mr. W. Browne says—

The Columbine, in tawny ten taken,
Is then ascribed to such as are forsaken.

The English name of Columbine is derived from *Columba*, the Latin name of the pigeon, as the nectaries of this flower are thought to resemble the head and neck of these birds. The generic name comes from *Aquila*, an eagle, from the fancied resemblance which the same parts of the flowers have to the claws of this king of birds. Some etymologists are of opinion that the name of *Aquilegia* is given to this plant, because the leaves, when not fully expanded, collect and gather a great deal of rain-water.

Gerard tells us that it was formerly called *Herba Leonis* by some persons, from a supposition that it was the favourite plant of the lion.

The French call it *Ancolie*, the Italians *Aquilegia* the Dutch *Agley* and *Akeleyen*, the Germans *Akeley* and *Agley*.

The common Columbine, *Vulgaris*, has long held a situation in our gardens, since it is mentioned by Dr. Turner in that part of his work which bears date 1564: he observes, that he had not seen it growing wild in England, but that he had found it in that state in Germany, and of different colours. Gerard tells us that it was cultivated both in the double and single state in his time.

It is a curious character in the natural history of this plant that it should take three distinct

modes of doubling its flowers. It is sometimes seen doubled by the multiplication of the petals, to the exclusion of the nectaries; at others, by the increase of the nectaries, to the exclusion of the petals; and frequently by the multiplication of the nectaries, while the proper petals remain. It also sports exceedingly in its dyes, as the seeds from one plant frequently produce great varieties of colour, from a white to a rich claret, or from white to blue, even to purple, and in the same rotation from white to rose-colour, frequently blotched with two or three hues, and sometimes with the nectaries of various colours, which adds to the airiness of its appearance. On the whole, it seems to have been formed by Flora in her most fantastic humour; and displays a graceful though rustic negligence, not exceeded by any flower on the parterre.

The Columbine sends up stems three feet in height, therefore care should be taken not to plant it before dwarf flowers. It may be planted in the shrubbery with good effect to succeed the blossoms of such shrubs as flower early. The Columbine continues in flower from the end of May to the end of July. Curious varieties may be increased by parting the roots, but the best manner of propagating these plants in general is by seed, which should be sown in August or September, and in

the following May the young plants may be placed out in a bed at about nine inches apart, where they will obtain strength by the autumn sufficient for transplanting into the spots where they are intended to flower in the following summer. It is, however, more desirable that they should be suffered to blossom in the nursery-bed, as by this means the best varieties may be selected and clumps formed of different colours, agreeable to the taste of the planter, or as may best harmonize with the neighbouring flowers.

The virtues of this plant for many malignant disorders have been highly extolled by old medical writers—every part of the plant from the root to the seed was thought efficacious for some particular complaint ; but as Linnæus tells us that he has known children lose their lives by an overdose of it, we shall forbear giving medical extracts, that might mislead the ignorant : and as to the Faculty of the present day, they need not our hints as to the authors who have written on the properties of this plant ; and were we to tell them that it was considered a cure for the plague, it might induce them to reply, “ No wonder it is become the emblem of folly !”

MONK'S-HOOD OR WOLF'S-BANE.

Aconitum.

Natural Order *Multisiliquæ. Ranunculaceæ*, Juss. A
Genus of the *Polyandria Trigynia* Class.

L'Aconit, au suc malfaisant,
Comme s'il s'armait pour la guerre,
Eléve un casque menaçant.

We could never find sufficient beauties in these plants to justify their common cultivation in our pleasure grounds, and we shall be glad to see them entirely expelled from the gardens of the cottagers, where they are generally found in greatest abundance. In our history of the Aconitum we shall have to relate such terrible effects of its virulent nature as must make us rejoice that it is not an indigenous plant of our soil.

The lines of Virgil may be happily used on this occasion :

Our land is from the rage of tigers freed,
Nor nourishes the lion's angry seed,
Nor pois'nous Aconite is here produced,
Or grows unknown, or is, when known, refused.

DRYDEN.

The ancients, who were unacquainted with

chemical poisons, regarded the Aconite as the most violent of all poisons, and accordingly they fable it to be the invention of Hecate, who caused the plant to spring from the foam of Cerberus, when Hercules dragged him from the gloomy regions of Pluto.

This from th' Echidnean dog dire essence draws.
 There is a blind steep cave, with foggy jaws,
 Through which the bold Tyrrinthian hero strain'd,
 Dragg'd Cerberus, with adamant enchain'd ;
 Who backward hung, and scowling, look'd askew
 On glorious day, with anger rabid grew ;
 Thrice howls, thrice barks at once with his three heads,
 And on the grass his foamy poison sheds.
 This sprung ; attracting from the fruitful soil
 Dire nourishment, and power of deathful soil.
 The rural swains, because it takes delight
 In barren rocks, surnamed it Aconite.

SANDYS' *Ovid*.

In the iron age of Ovid, the poet pictures the stepdame as preparing a deadly potion of Aconite.

Lurida terribiles miscent Aconites Noverca.

It was with this venomous plant that the ancients poisoned their arrows when in pursuit of ferocious animals, as also when following their more brutal trade of slaughtering their fellow-creatures. Theophrastus observes that the Aconitum yields a poison which at some times causes instant death, whilst at others its effects are lingering, but certain. Fatal experience has so sufficiently established its virulent nature in modern times, that it should be admitted

with the greatest caution into the garden, since we find that some persons, only by taking in the effluvia of the herb in full flower by the nostrils, have been seized with swooning fits, and have lost their sight for two or three days.

The root of plants in general is the most powerful part, and as some of the species of Aconitum have roots which resemble those of the horse-radish, accidents of a terrible nature have occurred from mistaking the one for the other, for a small portion is sufficient to cause instant death. Matthiolus relates that a criminal was put to death by taking only one drachm of this root. Dodonæus gives us an instance which occurred in his time, of five persons at Antwerp, who ate of this root by mistake, and all died. Dr. Turner also mentions that some Frenchmen at the same place, eating the shoots of this plant for Masterwort, all died in the course of two days, except two players, who were saved by emetics. Gerard tells us of a surgeon named Matthews, of Boston in Lincolnshire, who, having found a root that had been grubbed up before the leaves appeared, was induced to bite it, so as to ascertain what it was, and it took such an instant effect upon him as to deprive him of speech, even before he could get a remedy, and that his life was only saved by immediate application to powerful medicines. We read in the *Philosophical Trans-*:

actions, Vol. 38, anno 1732, of a man who was poisoned in that year, by eating some of this plant in a salad, instead of Celery. Dr. Willis also, in his work *De Animis Brutorum*, gives an instance of a man who died in a few hours, by eating the tender leaves of this plant, also in a salad. He was seized with all the symptoms of mania. The Aconitum is equally pernicious to animals. Wepfer informs us that a wolf, which had taken a dose of two drachmas, would, in all probability, have died through it, had he not been dissected, living as he was, in order to observe the effects of the poison.

Mr. Waller observes, in his *Domestic Herbal*, that the principal thing to be done in the case of this and other vegetable poisons is, to procure vomiting by any means; the most speedy and effectual method is to force the finger or a feather down the throat, and keep up a titillation of the fauces. This will generally succeed, when the strongest emetics fail, and ought not to be delayed a moment after it is once ascertained that Aconite has been swallowed, as the danger is always in proportion to the quantity swallowed, and the length of time it remains in the stomach. After the poison has been evacuated, some cordial or a little wine may be given with advantage.

This plant is particularly dangerous to children, boys especially, who so frequently have their fingers

cut or scratched by some accident. If the juice of this plant, in gathering a branch, should by chance reach the part scratched, it will produce the most alarming symptoms, such as excessive pain, not only in that particular part, but extending over the whole limb, heartburn, dread of suffocation, fainting, and, at last, mortification.

The Aconite, however, with all its formidable terrors, was found by Dr. Storch, a German physician, to possess properties that relieve some of the most distressing disorders incident to the human frame; but as it is a medicine of too dangerous a nature for any but the skilful practitioner to meddle with, we forbear naming the complaints for which it has been found serviceable. As the dried plant loses, in a great measure, its efficacy in medicine, we recommend the young student to make himself perfectly acquainted with every species of the *Aconitum*, so as to know its flower, leaf, and root; and we further intreat them, when they see this plant growing in the gardens of cottagers, that they would make its dangerous properties known.

We have already observed, by a translation, these lines from Ovid,

Quæ quia nascuntur dura vivacia cante,
Agrestes Aconita vocant,—

that the *Aconitum* was supposed to derive its name from growing on rocks almost destitute of soil.

Theophrastus derives it, and with more apparent reason, from *Axoris*, *Acone*, a city of Bithynia, near which place it is stated to have grown in great abundance. Some etymologists derive the name from *Axων*, 'Axων, Dart, because the barbarians used the plant to poison their darts; others think it is from 'Ακονίζομαι, to accelerate, because it hastens death.

The English name of Wolf's-bane is of great antiquity, being the same as that of the Anglo-Saxon. It is called Monk's-hood, from the upper petal of the flower, which bends over the parts of fructification in the shape of the hood worn by monks. The Germans call it *Munch Cappen*, Monk's cap or hood. It is also called Helmet-flower by some, who consider it to resemble a helmet. The French name of this dangerous plant is *Aconit*, and the Italian *Aconito*, and most of the other European languages also derive it from the Latin.

We make it the emblem of knight-errantry, because it rears its threatening and gloomy helmet as if to protect the gay favourites of Flora.

The common Monk's-hood, *Aconitum Napellus*, which elevates its dingy blue helmet flowers on such exalted spikes from the month of May to the end of July, is a native of Germany, and some other parts of Europe. The white-flowered, *Aconitum Album*, is from the Levant, and the yellow species,

Lycocionum, is indigenous to the Alps, and other continental mountains. This latter species, as well as the Blue Monk's-hood, has been cultivated in our gardens for many ages, since it is mentioned by our earliest writers on plants.

We shall not dwell upon the propagation of these plants, since neither poison, Monk's-hood, nor Helmets, stand high in favour with the peaceable florist.

CONVOLVULUS, OR BINDWEED.

Natural Order *Campanaceæ*. *Convolvuli*, Juss. A
Genus of the *Pentandria Monogynia* Class.

Convolvulus, expand thy cup-like flower,
Graceful in form, and beautiful in hue.

BARTON.

Regardez : ce beau Liseron
Dessine sa légère cloche
A travers cet épais buisson
Dont l'épine défend l'approche.

THIS beautiful genus of plants is sufficiently numerous to fill an entire volume with their description alone. Martyn described no less than one hundred and ten kinds, as long back as 1807, since which time several species have been added, as the *Hortus Kewensis* then contained only thirty-three species, which are now increased to forty-nine. Europe claims only fourteen species, but three of which are natives of the British Islands, the remainder being indigenous to the Indies and America.

The species most familiar to our gardens, are the Trailing, *Convolvulus Minor*, or *Tricolor*, and the *Convolvulus Major*, *Purpureus*. Both of these

kinds were known in our gardens as long back as the time of Charles I., as Parkinson tells us, in 1629, that he received the seeds of the *Convolvulus Minor* "out of Spain and Portugal, from Guillaume Boel." He speaks of this flower with delight, and tells us, "it is of a most excellent fair skie-coloured blew, so pleasant to behold, that often it amazeth the spectator." This species is now ascertained to be a native of Barbary, from whence it travelled first to Spain, and has since been scattered over the whole of Europe. It is now so common in Spain, Portugal, and Sicily, as to be considered one of their native weeds. It is called *Tricolor*, from the three colours of its beautiful corolla, which are yellow at the base, with rays of white that divide it from the fine ultramarine blue of the edge of the flower, which, as it expands to the sun, forms a most gracefully-shaped cup or chalice, like the end of a French-horn, and which, in the reversed state, resembles the elegant roofs of the Chinese pagodas. The *Convolvulus* opens and closes its monopetalous flower with folds similar to those of a parasol, which are never expanded at night, or in wet weather, in order that the anthers and stigma may be guarded from the humidity of the air, and on this account it is named by the French *Belle-de-Jour*, Day Beauty. This is not a climbing plant, but carries its branches in a hori-

zontal position, so that a few seeds are enough to form a clump of sufficient size to give effect in the garden, from the month of June to the end of August ; and as, during this season, the prevailing colours of the parterre are reds and yellows, the fine blue of this flower is particularly desirable to form a contrast.

The seeds of this annual plant are generally sown in the spring, but it is desirable to sow some in the autumn also, as they will flower a month earlier than those sown in the other season, which prolongs the enjoyment of their flowers. The seed should not be covered with more than about half an inch of earth in depth, and from three to five seeds are sufficient for each clump, unless where it is desirable to cover large sunny banks with these beautiful blue corollas.

As we are not in the confidence of the Moorish dames, we are ignorant of the use they make of this flower in emblematical language ; but being unwilling to suffer it to remain useless to the ladies, we give it as significant of the word extinguish, that when they have made their happy choice, they may have something appropriate to bestow on their hopeless suitors.

CONVOLVULUS MAJOR. *Purpureus.*

This elegant climbing plant is a native Bindweed of America, from whence the seeds appear to have been first received in Italy, and from thence they were procured to beautify our parterres prior to 1629, as they are recorded by Parkinson amongst the flowers which embellished our gardens in that age. This is a more delicate species than the former, and requires the aid of a hotbed to bring the young plants forward, which may be planted out in warm situations about the end of May. It is usually employed to cover the trellis work of arbours, porticoes, and virandas, for which it is well adapted, on account of its climbing and binding nature, whilst its graceful-shaped corollas display the most beautiful shades of violet, reddish purple, and lilac, which are sometimes delicately shaded, and at others striped, so as to form a star; others are of a pure white, or slightly-tinged with purple—

— as stands the rainbow in the storm,
Changing its hues with bright variety.

Lord BYRON.

These plants will frequently climb to the height of ten or twelve feet; and when planted so as to receive the support of young trees, they have a more agreeable effect than when upheld by a stake.

In Jamaica this species of Convolvulus climbs the highest trees, suspending its china-looking cups from the branches in a most delightful manner, sometimes dangling in the air, and at others forming graceful festoons.

It is from this twining nature of the plant that the name of Convolvulus has been bestowed on it; and perhaps we have not a native weed that displays a more beautiful corolla than the Great Bindweed or *Convolvulus Sepium*, which entwines itself so firmly amongst the shrubs of our hedgerows until it reaches the top, where it expands its monopetalous flowers in a dress that challenges the spotless snow for purity, and would demand more general admiration were it less common.

Witness the neglect
Of all familiar prospects, though beheld
With transport once.

AKENSIDE.

However we may admire this species of Bindweed in our hedgerows, we must be cautious to keep it out of shrubberies, in which, if it once enter, it cannot be easily eradicated, as the smallest piece of its rambling roots is sufficient to spread over a garden, where it frequently entwines its roots amongst those of Roses or other shrubs, so as to make it exceedingly difficult to prevent its overpowering the plants which support it, and next to impossible to destroy it altogether. We are told that swine are

excessively fond of this root, and we have frequently observed them grubbing for and devouring it with great eagerness; but as these animals are bad gardeners, we cannot avail ourselves of their assistance in the extirpation of the *Convolvulus Sepium* without incurring a greater evil.

Our readers probably recollect La Fontaine's fable, "Le Jardinier et son Seigneur." We might, in such case, quote the following lines :

————— on mait en piteux équipage
Le pauvre potager : adieu planches, carreaux :
Adieu chicorée et poireaux :
Adieu de quoi mettre au potage.

We add this flower and its entwining branch to the hieroglyphical language of flowers, as the emblem of a dangerous insinuator.

THE SMALL BINDWEED. *Convolvulus Arvensis.*

This plant, although more humble in its growth, is more formidable to the husbandman than the Great Bindweed, which principally confines itself to the hedgerow, whereas the *Arvensis* travels over the whole field, entwining itself around the stalks of corn for support, or upholding itself by the

blades of grass, or whatever comes in its way, not even refusing to embrace the nettle for the sake of a prop to display its beauties on, which are but little inferior, in point of colouring, to the beautiful cups of the *Convolvulus Major*, whilst it possesses an agreeable fragrance which the other cannot boast of.

Nature has endowed this native flower of our fields with the means of protecting its parts of fructification from the humidity of the night air by the help of folds in the cup, which regularly open with the rising of the sun, and close as the day decreases, or at the approach of rain. The nectary of this little flower also displays the wise provision which Nature has made to secure this saccharine juice, so essential to the formation of the seed. The stigma of this flower is supported on arches over the bottom of the cup of the corolla, leaving only such small openings between the piers that form the arches as to bid defiance to the plunder of the bee or insects of any considerable size: yet it seems to support an animal peculiar to this plant, for we seldom look into the blossom of this field *Convolvulus* without seeing several minute insects busily employed in their ingress to and egress from this cavern of sweets. These insects are of the same lilac colour as the anthers of the flowers, and, we presume, are mere children of the day, whose exis-

tence is necessary to the plant, and who perish with the flower that supports them. This species of Bindweed has a perennial root, of a white milky substance, which penetrates in a serpentine direction so deeply into the earth, and is so firm in its tenacity, as to render it next to impossible to destroy it: for every atom of it left in the ground, at whatever depth, will reach the surface as a perfect plant. In trenching of lands we have frequently seen it at the depth of three feet, being the pest of the garden and arable lands where it abounds. Miller says it is generally a sign of gravel lying under the surface, and he adds that, from the depth it penetrates into the ground, it is by some country people named Devil's-guts. It also bears the names of Cornbind, Withbind, Bindweed, Barebind, and Hedge-bells.

"This plant represents to us," says Lucot, "an obstinate person who persists in his opinion, and prefers being torn in a thousand pieces sooner than yield benevolently to what is required of him:" hence we pronounce it the emblem of obstinacy.

We cannot close our history of the *Convolvulus* without reminding our medical friends that it is to this genus of plants that they are indebted for two of their most powerful drugs. Jalap is obtained from the *Convolvulus Jalapa* of South America, which takes its name from Xalapa, a province lying between Mexico and La Vera Cruz.

The Scammony of the shops is obtained from the *Convolvulus Scammonia* of the Levant, but our great Bindweed is thought to possess the same medical properties. Dr. Witherington remarks that "it is unnecessary to import Scammony from Aleppo, when a medicine with the very same properties grows spontaneously in many of our hedges."

This genus of plants also affords the inhabitants of tropical climates a valuable species of food, as it is the *Convolvulus Batatas* which produces the tuberous roots called Batatas or Spanish potatoes.

**LOVE IN A PUZZLE, LOVE IN A MIST,
DEVIL IN A BUSH, OR GARDEN FEN-
NEL FLOWER. *Nigella Damascena*.**

Natural Order *Multisiliquæ*. *Ranunculaceæ*, Juss.
A Genus of the *Polyandria Pentagynia* Class.

THE neglect of the poets with regard to this singular flower has been amply compensated by the attention of the nomenclators of plants, as in addition to the names, which head the history of this floral curiosity, we find it sometimes called Gith, Bishop's-wort, and Saint Catherine's flower.

We meet with the same success in our researches in the French language, which offers a long list of names but not a single couplet. It is frequently called *Cheveux de Vénus*, Venus's Hair, *Patte d'araignée*, Spider's Claw, *Barbe Bleue*, Blue-beard, &c.

The name of *Nigella* is given to this plant from the blackness of the seeds. That of fennel-flower is now nearly obsolete, although it gives a better idea of the plant than any other English name, since the blue petals of this flower are surrounded by linear leaflets similar to the foliage of the Fen-

nel plant. We presume it was called Devil in a Bush from the crooked horn-shaped capsules being encompassed by the branching leaves described ; and Love in a Puzzle, from this pretty flower being seated in a cheveux de frise of linear foliage : we therefore make it the emblem of embarrassment.

The Nigella is a native of the south of Europe, where it grows amongst the corn in the same manner as the blue corn bottle-flower grows with us. It was cultivated in our gardens as long back as 1570, and Gerard speaks of it with double flowers in 1597 : thus Love in a Puzzle seems to have been as common in the reign of our virgin queen as it has been in later times, and as it was of old amongst the gods themselves, if we may believe Anacreon.

One day, the Muses twined the hands
Of baby Love with flow'ry bands ;
And to celestial Beauty gave
The captive infant as her slave.
His mother comes with many a toy,
To ransom her beloved boy ;
His mother sues—but all in vain—
He ne'er will leave his chains again.
Nay, should they take his chains away,
The little captive still would stay :
“ If this,” he cries, “ a bondage be,
Who could wish for liberty !”

MOORE'S Translation.

Love in a Puzzle is easily propagated, as many besides the gardener can tell us. It flourishes

equally in the garden of the courtier and the cottager, for wherever the seeds are thrown this entangling plant is sure to spring up.

Miller recommends the seed of the Nigella to be sown in March ; and observes that, where the soil is dry and the situation sheltered, some seeds may be sown in August as soon as ripe, as these plants not only blossom earlier, but produce finer flowers.

MIGNONETTE. *Reseda Odorata.*

Natural Order *Miscellaneæ*. *Capparides* and *Resedaceæ*, Juss. A Genus of the *Dodecandria Trigynia* Class.

— The fragrant weed,
The Frenchman's darling.

COWPER.

Vos qualités surpassent vos charmes.

IT is not yet an age since this fragrant weed of Egypt first perfumed the European gardens, yet it has so far naturalized itself to our climate as to spring from seeds of its own scattering, and thus convey its delightful odour from the parterre of the prince to the most humble garden of the cottager.

In less than another age, we predict (without the aid of Egyptian art) that the children of our peasants will gather this luxurious little plant amongst the wild flowers of our hedge-rows.

The *Reseda Odorata* first found its way to the South of France, where it was welcomed by the name of *Mignonette*, Little-darling, which was found too appropriate for this sweet little flower to be exchanged for any other. By a manuscript note

in the library of the late Sir Joseph Banks, it appears that the seed of the Mignonette was sent in 1742, by Lord Bateman, from the Royal Garden at Paris, to Mr. Richard Bateman, at Old Windsor; but we should presume that this seed was not dispersed, and perhaps not cultivated, beyond Mr. Bateman's garden, as we find that Mr. Miller received the seed from Dr. Adrian van Royen, of Leyden, and cultivated it in the Botanic Garden at Chelsea, in the year 1752. From Chelsea it soon got into the gardens of the London florists, so as to enable them to supply the metropolis with plants to furnish out the balconies, which is noticed by Cowper, who attained the age of twenty-one in the year that this flower first perfumed the British atmosphere by its fragrance. The author of the Task soon afterwards celebrates it as a favourite plant in London;—

— the sashes fronted with a range
Of orange, myrtle, or the fragrant weed.

The odour which this little flower exhales is thought by some, whose olfactories are delicate, to be too powerful for the house; but even those persons, we presume, must be delighted with the fragrance which it throws from the balconies into the streets of London, giving something like a breath of garden air to the “close-pent man,” whose avocations will not permit a ramble beyond the squares

of the fashionable part of the town. To such persons it must be a luxurious treat to catch a few ambrosial gales on a summer's evening from the heated pavement, where offensive odours are but too frequently met with, notwithstanding the excellent regulations for cleansing the streets, and the natural cleanliness of the inhabitants in general. We have frequently found the perfume of the Mignonette so powerful in some of the better streets of London, that we have considered it sufficient to protect the inhabitants from those effluvias which bring disorders with them in the air. The perfume of Mignonette in the streets of our metropolis reminds us of the fragrance from the roasting of coffee in many parts of Paris, without which some of their streets of business in that city would scarcely be endurable in the rainy season of the year.

The Sweet Reseda, or Mignonette, is now said to grow naturally in some parts of Barbary, as well as in Egypt. Monsieur Desfontaines observed it growing in the sands near Mascar in the former country, but it might have been accidentally scattered there, or have escaped from the gardens of the Moors.

This genus of plants, of which we have twelve species, was named *Reseda* by the ancients, from *resedare*, to assuage, because some of the species

were esteemed good for mitigating pains ; and we learn from Pliny, that the Reseda was considered to possess even the power of charming away many disorders. He tells us that it grew near the city of *Ariminum*, now Rimini, in Italy ; and that when it was used to resolve swellings, or to assuage inflammations, it was the custom to repeat the following words, thrice spitting on the ground at each repetition :

*Reseda, morbos Reseda ; scisne, scisne, quis hic pullos egerit ?
Radices nec caput nec pedes habeant.*

Reseda, cause these maladies to cease : knowest thou, knowest thou, who hath driven these pullets here ? Let the roots have neither head nor foot.

We notice these absurd superstitions of the ancients, which are scarcely yet extinct in many country villages of this and other countries, to show how much the minds of the ignorant have always been prone towards the marvellous, and not that we

Hold each strange tale devoutly true.

Although it is so short a time since the Sweet Reseda has been known in Europe, we find that it has crept into the armorial bearings of an illustrious family of Saxony ; and, as Cupid does not so frequently bestow heraldic honours as his father Mars, we cannot avoid relating the romantic tale which introduced this fragrant and modest little flower to the Pursuivant-at-Arms.

The Count of Walsthim was the declared lover and intended spouse of Amelia de Nordbourg, a young lady possessing all the charms necessary for the heroine of a modern novel, excepting that she took delight in creating little jealousies in the breast of her destined husband. As the beautiful Amelia was an only child of a widowed mother, a female cousin, possessing but few personal charms, and still less fortune, had been brought up with her from infancy as a companion, and as a stimulus to her education. The amiable and humble Charlotte was too insignificant to attract much attention in the circles in which her gay cousin shone with so much splendour, which gave her frequent opportunities of dispensing a part of that instruction she had received on the more humble class of her own sex. Returning from one of these charitable visits, and entering the gay saloon of her aunt, where her entry or exit was now scarcely noticed, she found the party amused in selecting flowers, whilst the Count and the other beaux were to make verses on the choice of each of the ladies. Charlotte was desired to make her selection of a flower; the sprightly Amelia had taken a Rose; others a Carnation, a Lily, or the flowers most likely to call forth compliment; and the delicate idea of Charlotte in selecting the most humble flower, by placing a sprig of Mignonette in her bosom, would proba-

bly have passed unnoticed, had not the flirtation of her gay cousin with a dashing colonel, who was more celebrated for his conquests in the drawing-room than in the field of battle, attracted the notice of the Count so as to make his uneasiness visible, which the amiable Charlotte, ever studious of Amelia's real happiness, wished to amuse, and to call back the mind of her cousin, demanded the verse for the Rose. The Count saw this affectionate trait in Charlotte's conduct, took out his pencil, and wrote for the Rose,

Elle ne vit qu'un jour, et ne plait qu'un moment,

which he gave to the lovely daughter, at the same time presenting the humble cousin with this line on the Mignonette :

Ses qualités surpassent ses charmes.

Amelia's pride was roused, and she retaliated by her attention to the colonel and neglect of the Count, which she carried so far as to throw herself into the power of a profligate, who brought her to ruin. The Count transferred his affections from beauty to amiability ; and rejoicing in the exchange, and to commemorate the event which had brought about his happiness, and delivered him from a coquette, he added a branch of the Sweet Reseda to the ancient arms of his family, with the motto,

Your qualities surpass your charms.

The Mignonette is one of the plants whose unassuming little flowers never weary our sight: it is therefore made the image of those interesting persons whom time cannot change, and who, although deficient in dazzling beauty, attach us for life, when once they have succeeded in pleasing without its aid. Hence it is but a natural desire that we should wish to give an annual plant a perennial existence, which has, in a great measure, been accomplished, since the odorous Tree Mignonette is now frequently to be met with. This was at first supposed to have been a different variety, when Lady Whitshed introduced it from Liege about the year 1816, that lady having received it from M. L'Abbé L'Arbaleste of that city,—a spot made familiar to many readers, by the scenes which the popular author of Quentin Durward has recited as passing in that ancient commercial town.

The Mignonette is transformed into a perennial shrub, which dispenses its odours at all seasons of the year, by the following simple treatment: a healthy young plant should be placed in a garden-pot, with a stick of about two feet in height inserted by its side to tie up its branches to, as it advances in height, the leaves and young branches being kept stripped off from the lower part, so as to form a stem to the height required. This stem will become sufficiently hard and woody to endure

the winter, by being placed in a green house, or the window of a common sitting-room, and may be preserved for several years, if air is given to it whenever the weather will allow, so that the young branches do not become too delicate. As soon as the seed-vessels begin to form they should be cut off, which will cause the plant to throw out a fresh supply of blossoms: but these plants should never be suffered to perfect their seed, as it would greatly weaken them, and generally cause their entire decay; for the Sweet Reseda is an annual in its proper climate, and therefore naturally decays when it has ripened its seed. We have made the same experiment on other annual plants which have survived through the winter, and produced blossom on the following year, when their flower-stalks have been cut off before the formation of seed has taken place. By this means, also, Stocks and Wall-flowers, which blossom in the spring, will be found to flower a second time in the summer, if their branches are cut off. We have frequently made the experiment on early-flowering Honeysuckles, and obtained a fine display of corollas in the autumn; for it appears almost like instinct in plants to endeavour to perform their office to nature in rendering up their various seeds. The philosophical reason of this apparent phenomenon is, that the roots have drawn up and furnished the trunk with the due proportion

of nourishment required to perfect the seed-vessels and the seeds, and the vital principle of the germ also rests in the trunk and branches until it is drawn forth by the various parts of fructification, which is prevented, by separating these parts from the branches ; consequently, the juices are forced into other directions, and form a second attempt to expand themselves, agreeably to their various nature.

Some florists, who considered the Tree Mignonette as a distinct species of the Reseda, obtained seeds of the Tree Mignonette from their seedsmen, who, considering it was the tall-growing Reseda, *Lutea*, sent such, which, after having been nursed up with care and potted with attention, proved to be only the common Reseda, or Dyer's Weed of our fields.

It is frequently observed that the seeds of the Sweet Reseda, which scatter themselves in the autumn, produce finer plants than those that are sown in the spring, which should teach us to sow a part of our seed at that season of the year, when, if not successful, it may be repeated in the spring, and we have generally found those self-sown plants most productive of seed.

To procure early-flowering plants of Mignonette, the seeds should be sown in pots or boxes in the autumn, and kept in frames through the winter ; but when this is omitted, the plants may

be forwarded by sowing the seed on a gentle hot-bed in the spring. A small border of Sweet Reseda will produce seed sufficient to scatter over a large portion of hedgerow-banks, and if one seed out of ten germinate amongst the bushes, it will be sufficient to fill whole vales with fragrance, "like a stream of rich-distilled perfumes."

VALERIAN. *Valeriana.*

Natural Order *Aggregatae*. *Dipsaceæ* and *Valerianæ*,
Juss. A Genus of the *Triandria Monogynia* Class.

Gay Loosetrife there and pale Valerian spring.
SCOTT.

IT seems a matter of doubt with some writers whether the Red Valerian of our gardens, *Valeriana Rubra*, be an aboriginal of our soil. The British Botanist and the Hortus Kewensis claim it as a native plant, although it is not acknowledged as such by Gerard, Parkinson, Ray, and other old writers. We are disposed to consider it an exotic of early introduction, principally on account of the situations where it is found growing, which are generally on the old walls of colleges, or on the ruins of monastic buildings. Such in former days were the only places where medicine was studied or medicinal plants cultivated. The Red Valerian was observed by Dr. Sibthorp on the walls of Merton College, Oxford. Mr. Martyn found it growing abundantly on Merton Abbey walls, in Surry. Mr. Relham notices it at Coton and Babraham, as well as on Ely Minster and the walls adjoining.

We have likewise seen it growing most abundantly on the ancient boundary walls of the gardens belonging to the episcopal palace of Chichester, in Sussex.

The old English name of Setewale, for this plant, is derived from the Saxon. Chaucer writes of it under this appellation as long back as the time of Edward the Third.

Ther springen herbes grete and smale,
The Licoris and the Setewale.

Dr. Turner, who compiled his Herbal during the reign of Queen Mary, calls it Setwall, and he observes that it is the plant which is named *Valeriana Major* by the common herbarists.

Gerard, who wrote in the succeeding reign, tells us that it was called "Holie Herbe, Juno's Teares, Mercurie's Moist Bloude, and Pigeon's Grasse, or Columbine, because Pigeons are delighted to be amongst it, as also to eate thereof."

The Latins are thought to have called this plant Valeriana, from its powers in medicine, or as some suppose after Vectius Valens, a favourite physician of the empress Messalina, wife to Claudius Cæsar, as it appears to have been called *Phu* previous to his time.

The Red Valerian grows naturally on the rocks of the Alps, and from the facility with which it

propagates itself in the garden or on old walls, it is made the emblem of an accommodating disposition.

The Valerian should be planted amongst the shrubs of the pleasure-ground, where its branching corymbs of deep rose-coloured flowers produce a good effect, from the month of June until the end of October. The variety with white blossoms is also very ornamental when disposed amongst shrubs or trees, but it is too large and scrambling a plant to hold a place in the parterre of choice flowers: added to which, cats are so fond of the perfume of these flowers, as to be attracted to it, and by rolling over the plant, destroy not only its beauty, but also that of all contiguous flowers, unless thorns are placed over them. The effects of this root upon cats are very peculiar: they will roll on it with ecstatic delight, and gnawing it to pieces, its action upon their nervous system appears to produce in them a kind of pleasing intoxication: it should, however, be remarked, that all cats are not equally affected by its effluvia. The Red Valerian, the Yellow Wall-flower, and the Blue Throat-wort, form a gay assemblage on rocky banks or old ruins.

The Valerian may be increased by parting the roots in autumn, as well as from seed.

It is the root of the wild Valerian, *officinalis*, which is principally used in medicine. "It is warm and aromatic, of a rather fetid smell. The proper-

ties of Valerian are more energetic when gathered before the plant rises into stalk. It acts as a sudorific, diuretic, and, in some measure, a deobstruent, exerting a peculiar influence on the nervous system. It appears, however, from experience, that all persons are not equally susceptible of its impression, as no sensible effect could be perceived in many, whilst others have been cured of epilepsies, and other desperate disorders of the nervous system, by the sole use of it. In the present practice, it is prescribed for hysterick and nervous affections."

—*Waller.*

Ettmuller highly extols its virtues in strengthening the eyesight, where it is weakened, especially by a want of energy of the optic nerves. In many parts of the continent the veterinary surgeons make great use of it for that purpose, especially to preserve and restore the sight of horses.

VERVAIN. *Verbena.*

Natural Order *Personata*. *Vitices* and *Verbenaceæ*,
Juss. A Genus of the *Didynamia Gymnospermia*
Class.

The Night-shade strews to work him ill,
Therewith the Vervain, and her Dill,
That hind'reth witches of their will.

DRAYTON.

Verveine, chasse-mal que les dieux ont cheri,
Montre-moi ta puissance, et d'amour me guéri.

PASSERAT.

THE very name of this plant seems to carry our thoughts back to the darkest ages of superstition, and we cannot look upon the Vervain with that indifference with which we regard most other humble herbs; for however ridiculous or absurd the religious customs of the ancient heathens may appear in modern times, still they will obtain a share of our respect, both on account of their antiquity and their national unanimity. Although we now see the Vervain stripped of all its reverential regard, it still attracts our notice, as it should our gratitude, that we are permitted to live in days when the terror of ignorant superstition has been banished by the mild rays of christianity.

The Vervain played a considerable part in the impositions which were practised upon the credulous in ancient times, and hence it is so frequently mentioned in profane history. The Magi of the ancient Elamites or Persians made great use of this plant in their worship or adoration of the sun, always carrying branches of it in their hands when they approached the altar. The magicians also employed the Vervain in their pretended divinations, and affirmed that by smearing the body over with the juice of this plant, the person would obtain whatever he set his heart upon, and be enabled to reconcile the most inveterate enemies, make friends with whom he pleased, gain the affections, and cure the diseases of whom he listed. When they cut this plant it was always done when neither the sun or moon was visible, and they poured honey and honeycomb on the earth as an atonement for robbing it of so precious an herb.

The Greeks called it *IεραΓοράνη*, the Sacred Herb, and it was with this plant only that they cleansed the festival table of Jupiter before any great solemnity took place; and hence, according to Pliny, the name of *Verbena* is derived. It was also one of the plants which was dedicated to the Goddess of Beauty. Venus the Victorious wore a crown of Myrtle interwoven with Vervain.

The Romans continued the use of this plant in

their sacred rites, sweeping their temples and cleansing their altars with it, and sprinkling holy water with the branches. They also hallowed or purified their houses with it, to keep off evil spirits. Their ambassadors, or heralds at arms, wore crowns of Vervain when they went to denounce war or give defiance to their enemies; which is thus noticed by Drayton,

A wreath of Vervain heralds wear,
Amongst our garlands named,
Being sent that dreadful news to bear,
Offensive war proclaimed.

The Druids, both in Gaul and in Britain, regarded the Vervain with the same veneration which they bestowed on the Mistletoe, and like the magi of the east, they offered sacrifices to the earth before they cut this plant in the spring, which was a ceremony of great pomp. Pliny tells us that the Druids made use of it in casting lots, and in drawing omens, and in other pretended magical arts.

Dark superstition's whisper dread
Debarr'd the spot to vulgar tread ;
“ For there,” she said, “ did fays resort,
And satyrs hold their sylvan court,
By moonlight tread their mystic maze,
And blast the rash beholder's gaze.”

WALTER SCOTT.

The Druids held their power through the superstition of the people, and as they were great pretenders to magic and divination, they excited the admiration, and took advantage of the ignorance

and credulity of mankind, for by these arts they pretended to work miracles and to exhibit astonishing appearances in nature, as well as to penetrate into the counsels of heaven.

Divested of these pretended powers, there is no doubt but that the Druids were better acquainted with the medicinal properties of herbs than any other class of men in their day ; since their residences being in the recesses of mountains, groves, and woods, where vegetable productions were constantly courting their attention, it is natural to suppose that they would in some measure become acquainted with the qualities of plants in general. That the Druids of Gaul and Britain applied themselves to this study, and made great use of herbs for medical purposes, we have sufficient evidence, since we learn from scattered hints in Pliny's Natural History, that they sometimes extracted the juice of herbs and plants, by bruising and steeping them in cold water, and sometimes by infusion in wine ; that they made potions and decoctions by boiling them in water ; and we learn also that they frequently dried certain herbs before infusing them, and that they administered some plants by fumigations, and practised the art of making salves and ointments of vegetables, for which they had great renown even at Rome, to which city they exported the Vervain, and hence it was called *Britannica*.

Although so many ages have passed away since the Druids and their pretended spells have been abolished, yet we frequently meet with lingering sparks of their imagined light amongst the vulgar, who upon every occasion cling to superstition as eagerly as the intimidated infant clings to the breast of a fond mother.

Madame de Latour tells us that the shepherds in the northern provinces of France still continue to gather the Vervain under different phases of the moon, using certain mysterious ejaculations known only to themselves, whilst in the act of collecting this herb, by whose assistance they attempt to cure not only their fellow-servants, but their masters also, of various complaints, and they profess to charm both the flocks and the rural belles with this plant.

The Germans to this day present a hat of Vervain to the new-married bride, as if to put her under the protection of Venus Victorious, which is evidently the remains of ancient customs.

Vervain is now very properly made the emblem of superstition.

The common Vervain *officinalis*, is a native of our soil, and is principally found by road sides, in dry sunny pastures and waste places about villages. Mr. Miller remarks, that although Vervain is very common, yet it is never found above a quarter of a mile from a house, which has occasioned its being

called Simpler's Joy. However it appears not to be entirely confined to such situations, since Dr. Withering observes that it is very plentiful at the foot of St. Vincent's rocks, all along the course of the river. This species grows also in most parts of Europe, Barbary, China, Cochin-China, and Japan. Its flowers form spikes of a pale lilac colour, which continue in blossom during the whole of summer.

The *Verbena Supina* is also an European species of this genera of plants, and is indigenous to the South of Europe. We have fourteen other species of Vervain, collected principally from America and the Indies; but as these have no connexion with ancient anecdote, we pass them, to observe that the Vervain, which held so high a rank amongst herbs in antique days, has passed almost into total neglect among the modern practitioners of medicine, although all writers seem to agree in attributing to it the property of relieving the most violent chronic head-aches, whether externally applied or internally taken. For this purpose it seems, however, to have been more frequently employed externally, the bruised leaves and stalks being used as a cataplasm. It was also much used for wounds.

Black melancholy rusta, that fed despair
Through wounds long rage, with sprinkled Vervain cleared.
DAVENANT.

SNAP-DRAGON. *Antirrhinum.*

Natural Order *Personatae*. A Genus of the *Didynamia Angiospermia* Class.

Of colours, changing from the splendid Rose
To the pale Violet's dejected hue.

AKENSIDE.

The stern and furious lion's gaping mouth.

COLUMELLA.

THIS singular flower is made the emblem of presumption, from its monopetalous corolla forming a mask, which resembles the face of an animal ; and it has from hence received various names, as Dog's Mouth, Lion's Snap, Toad's Mouth, and Snap-Dragon. On pressing the sides of this flower it opens like a gaping mouth, the stigma appearing to represent the tongue ; on removing the pressure, the lips of the corolla snap together, and hence it has been named Snap-Dragon. It is frequently called Calf's Snout, from the form of its seed vessel, and the French name it *Mufle de Veau* on the same account.

The Snap-Dragon belongs to the family of the Toad-Flax, and is a flower which we cannot examine without admiring how wonderfully it is adapted

for the bleak situations in which it grows naturally, as on the highest rocks, or out of the crevices of the most exposed cliffs, or the chinks of the loftiest towers : in all of these situations its parts of fructification are guarded against the tempest by the singularly-shaped corolla, which defies either wind or rain to enter the flower until impregnation has taken place, when the mask falls off to allow a free access of air to the seed vessel. We have frequently remarked that the bees, and more particularly the humble-bees, have entered this flower by pressing open the lips, as if they were conscious that such an opening existed, although it shuts so close as to deceive the nicest eye, and snaps to the moment the insect has gained admittance, leaving it to revel unobserved within the mask, from which it makes its exit with the same ease as it entered. This species of instinct approaches near to reason, since the bee cannot have been trained or instructed to this habit.

Linnæus placed this plant in the fourteenth class of his sexual system, which he named *Didynamis*, from the Greek δι, twice, and δύναμις, power, because the flower is furnished with four stamens, two of which are always considerably longer than the other two, and converging close to the upper lip of the corolla, each pair of anthers approaching, which renders the distinction of this class very striking.

This plant produces its flowers on a spike, but the whole of them fronting one way, which is generally to the sun ; and as it gives out numerous branches from two to three feet in height, it becomes highly ornamental, particularly amongst dwarf shrubs. The colours of these flowers are numerous, consisting of all the shades of a rich orange and yellow down to white, with the same varieties in reds and purple, and an endless change of party colours, the most esteemed of which is that with a gold-coloured throat, and a dark crimson mouth and lips.

The Snap-Dragon grows naturally in the South of Europe ; and as it is frequently found on the cliffs of Dover, is now classed as one of the native plants of England, although it is generally supposed not to have been originally belonging to our soil.

These plants love a light soil and an open sunny situation, but when transplanted into a rich and moist earth they produce larger flowers, though the plant generally dies in the winter, whilst those that grow on a dry or rocky soil continue for several years. They are easily raised from seed, which should be sown in April, and it may be increased also by cuttings if planted during the summer months. When intended to ornament rock-work, the seeds should be scattered both in the autumn

and in the spring, which will ensure a supply of plants without further trouble; and they are observed to endure the winter better in such situations than when growing in the borders of the garden.

The *Antirrhinum* may be considered rather a rustic than an elegant plant, and it should therefore not occupy a place in the parterre amongst choice flowers, but should be mixed with the shrubs in the back-ground, or placed on the banks or most elevated parts of the grounds, where, when in large clumps, it produces a showy effect from the end of spring to the autumn.

The use of eating oil in this country being so confined to the wealthy and higher orders of society, that the middle and lower classes have rather an antipathy than a desire for it in their food, this checks the cultivating of those plants that would afford us a substitute for olive-oil. Most of the continental countries consume a great deal of oil, which they consider indispensable in their diet, and hence they seek plants whose seeds yield the best oil. In Russia the *Antirrhinum* is sown for the sake of the seed, which produces by expression an oil little inferior to that obtained from olives.

LYCHNIS. *Lychnis.*

Natural Order *Caryophylleii*. A Genus of the *Decandria Pentagynia* Class.

The decorated fields
With all their flowery tribe, cannot equal
Those lovelier flowers, that with delight I view
In the fair garden.

MILTON.

THE *Lychnis Chalcedonica* may justly be ranked amongst the most ornamental of our hardy flowering plants, carrying its large tufts of brilliant scarlet flowers on stems of from two to four feet in height, as if to illuminate the parterre by the glow of its vivid colour. The double-flowering white variety is regarded by the Dutch as one of their finest flowers; and we cannot withhold our regret that this variety, as well as the pale-red, or rosy-petaled, should remain so great a rarity in our gardens, which their presence would so much contribute to beautify.

Pliny tells us that this flower was surnamed *Flammea*, on account of its flaming colour, which is frequently nearer the colour of fire than of scarlet. The Latin name of *Lychnis* being the same as the Greek for this plant, which both Theophrastus and

Dioscorides write *Λυχνίς*, induces us to think that it was originally a plant of more eastern nations; and Pliny speaks of it as an Asiatic plant.

It appears to have been brought to this country from Constantinople, since Gerard, who tells us that it was common in English gardens in 1596, calls it "Flower of Constantinople, and Campion of Constantinople." He also calls it *Lychnis Chalcedonica*, which seems to affirm it to be a native of Asia Minor; yet in some of our most esteemed botanical works it is placed as a Russian plant, which so ill accords with its specific name. Ulyssus Aldrovandus, an Italian, who visited many countries in search of plants, and who wrote on natural history prior to Gerard, calls it *Flos Creticus*, Flower of Candia.

Some etymologists conjecture, that the name of *Lychnis* is derived from *λυχνός*, *lucerna*, a lamp, either on account of the flame-colour of the petals, or because the down of the leaves was sometimes used to make wicks for lamps.

It is more than probable that this species of *Lychnis* was introduced into Europe during the crusades, since we find so many of the Continental languages agree in calling it the Cross of Jerusalem, the French *Croix de Jérusalem*, the Spaniards *Cruces de Jérusalem*, the Italians *Croce di Cavalieri*, the Germans *Hierosolymorum flos*, but the

Portuguese name it *Cruz de Malta*, from the shape of the flower, as we suppose, which resembles the Maltese cross.

This flower does not appear to have been used in emblematical language, and we, therefore, place it to represent religious enthusiasm.

The Scarlet Lychnis is a perennial plant, that continues in blossom from the end of June to the beginning of August, and is particularly well adapted to mix with flowering shrubs, both on account of its height and the splendour of its flowers. It is easily propagated from seed, which should be sown in March, on a border exposed to an eastern aspect ; about the beginning of June the plants should be removed to a bed, where they may be placed about four inches apart, giving them water and a temporary shade until they have made fresh roots. In this bed they may remain until the autumn, when they may be planted into the spots where they are intended to flower ; and we recommend them to be placed not less than five or seven plants in a cluster, so as to give a mass of flowers in each situation. When the flowers are faded, the stems should be cut down, which strengthens the plant for succeeding years, as a single flower-stem will produce a sufficient quantity of seed for a large garden.

The double varieties are increased by slips taken

from the roots in autumn, or by cutting off the flower-stalks in June, before the blossom appears. These stalks should be cut into lengths, having three or four joints to each, and planted in a border of soft loamy earth, with an eastern aspect ; the stalks to be planted so as to leave but one eye above the earth : they should have moderate watering, and then be covered with a hand-glass, so as to exclude the outward air, and shaded with mat^s when the sun falls hot upon them. These stalks take root in about six weeks, when they may be exposed by degrees to the open air ; and in the autumn they may be removed to the parterre where they are to flower the following summer. If too much water is given to these plants, or if planted in too damp a soil, they are liable to rot and decay ; and it should be observed to give the double varieties a warmer and more sheltered situation than the single kinds, since they are more liable to be injured by the frost.

The Ragged Robin, Cuckoo Flower, or Meadow Pink, *Floscuculi*, is a native species of *Lycn-nis*, which has been taken from our meadows into the garden, and, by the art of doubling the petals, has become an ornamental plant amongst shrubs, or in the background of flower-borders.

This pretty plant is called Ragged Robin, from the finely-cut or ragged appearance of its petals,

and Cuckoo Flower, in common with several other plants that blossom about the time this welcome and merry messenger of Spring begins its monotonous song, when

The schoolboy wandering in the wood
To pull the flowers so gay,
Starts—its curious voice to hear,
And imitates its lay.

The *Lychnis Dioica*, Bachelor's Buttons, is also a native plant, whose petals have been multiplied by the ingenuity of the florists to embellish the parterre.

EVENING, or TREE PRIMROSE. *Oenothera Biennis.*

Natural Order *Calycanthemæ*. *Onagræ*, Juss. A Genus of the *Oclandria Monogynia* Class.

You, Evening Primroses, when day has fled,
Open your pallid flowers, by dews and moonlight fed.

BARTON.

THIS North American flower was first sent from Virginia to Padua, in the year 1619, but at what exact period it reached England is uncertain, since Parkinson is the earliest author who notices it; but it must have been some time previous to 1629, as in his "Garden of Pleasant Flowers," which was published in that year, he speaks of it in a more familiar style than he would have done had it been of late introduction. This author calls it Tree Primrose of Virginia. This plant bears its primrose-coloured flowers on branches of three or four feet in height; and hence it was called Tree Primrose, and Evening Primrose, or Evening Star, because the flowers burst open and expand in the evening, generally between six and seven o'clock, which is thus noticed by Dr. Langhorne :—

The Evening Primrose abhors the day,
Blossoms only to the western star,
And loves its solitary ray.

We have frequently stood over this plant to watch the expansion of its flowers, the petals of which are confined together by means of the calyx, the ends of which meet over the corolla, and clasp each other by a hook. As the corolla swells in its confinement the segments of the calyx separate at bottom, and discover the primrose corolla, which appears to be gradually inflating with a gaseous fluid, until it acquires sufficient expansive force to burst the hooks of the calyx. When its petals are thus freed, they expand instantaneously to a cup shape, and in about half an hour after they progressively spread until they become quite flat: by the morning the flowers become flaccid, so that the impregnation must take place after sunset.

The Great-flowered Evening Primrose, *Oenothera Grandiflora*, is also a native of North America, and was introduced to our gardens in the year 1778, by John Fothergill, M.D. This species possesses an agreeable fragrance, and hence it is more esteemed than the *Biennis*.

The Evening Primrose is made the emblem of inconstancy, and is therefore seldom worn by the fair, excepting by those gay belles who love to coquet with and tease their smitten swains.

These biennial plants are raised by sowing the seeds in autumn, on a border, where the plants should remain until the following autumn, when they may be removed to the situations where they are intended to flower the following summer. In removing them care is required to avoid breaking the roots, which run deep into the ground. The common kind will grow in almost any soil and situation, but the *Grandiflora*, being more delicate, requires a south aspect and a free light earth.

The Sweet-scented or Curl-leaved Evening Primrose, *Oenothera Odorata*, is a plant of late introduction, which, from its delightful fragrance and hardy nature, is likely to supersede the other species, so as to banish them from the best gardens. We are indebted to the late Sir Joseph Banks for this species of *Oenothera*, he having purchased the seeds amongst others, which had been collected by the surgeon of a merchant-ship, at Port Desire, on the coast of Patagonia. The plants were first raised in Europe in 1790: their native place is now said to be on the banks of Champion river.

This proves to be a tolerably hardy perennial plant, growing freely in most situations, and producing plants wherever the seed scatters itself. The stem does not die completely down, even in the open air, and when protected in a conservatory,

it becomes an evergreen shrub, singular by its waved foliage, beautiful by its yellow blossoms, delightful for its perfume, and curious because its flowers only open

When weary peasants at the close of day
Walk to their cots, and part upon the way ;
When cattle slowly cross the shallow brook,
And shepherds pen their folds, and rest upon their crook.

CRABBE.

BALSAM. *Impatiens.*

Natural Order *Corydales*. *Geraniæ*, Juss. A Genus
of the *Pentandria Monogynia* Class.

Balsam, with its shaft of amber.

THIS delicate and beautiful plant is a native of the East Indies, China, Cochin China, and Japan, and it may be ranked amongst the most elegant annual flowers which the warmer climates have afforded us; yet it is greatly neglected by the English florists of the present day, who have, in great measure, laid it aside for plants that are more precarious in rearing, and less beautiful when raised.

The love of novelty even in plants often leads us from old established favourites to less interesting objects; and where Fashion points the way, we as naturally follow, as if this supreme directress were incapable of error. We shall therefore entreat the gay nymph to renew her smiles on this eastern plant, whose wax-like flowers contributed as essentially to embellish the British parterres of the last age as they do those of the continent at present. The Balsam has the peculiar advantage of retaining all its splendour and freshness during the drought of

the hottest months, when many other plants are withered before they have flowered, which renders it a valuable ornament for the summer months.

When properly treated, these succulent plants reach the size of a moderate flowering shrub. Martyn says—" I have seen the stem seven inches in circuit, and all the parts large in proportion, branched from top to bottom, loaded with its party-coloured flowers, and thus forming a most beautiful bush." Mr. Fairweather speaks of others four feet in height and fifteen feet in circumference, with strong thick stems, furnished with side branches from bottom to top, and these covered with large double flowers. (*Hort. Trans.* S. 406.)

We have frequently observed the Balsam in the gardens of Paris having more the appearance of a brilliant-flowering shrub than an annual plant, ornamenting the quarters of the royal gardens of the Tuilleries and the Luxembourg by its petals of scarlet, crimson, brick red, purple, white, variegated, party-coloured or delicate blush ; this last variety frequently being as double, and nearly as large, as a moderate Rose, and the whole plant covered with flowers, resembling by their transparent nature a shrub formed of the most delicate porcelain.

The Balsam demands our attention by two singularities in its nature exclusive of its beauty. The

first is the elasticity of the capsule when ripe, which darts out its seed the moment it is touched, and hence the generic name of *Impatiens* has been given it; and it has, on the same account, been made the emblem of Impatience, but the Turks represent Ardent Love by this flower.

The foliage of this plant is of a fine green colour, shaped like that of the almond or peach-tree, but contrary to the nature of plants in general it droops in the cool of the night, whilst it erects itself in the heat of day, which causes most other plants to fade. From this singularity of the Balsam, it has been ingeniously compared to the way of a coquette, who, when deprived of beauty, spends the whole of the day in preparing embellishments, by which she may shine for a few hours in the evening circles of the gay and thoughtless.

By whom and at what time the Balsam was first introduced to this country is uncertain; but it was evidently an inmate of our gardens at a much earlier period than is noticed by Martyn, in Miller, or by Aiton in the *Hortus Kewensis*, who mention its cultivation by Gerard in 1596. Dr. Turner tells us, in 1564, that it "groweth much in Italy, and some places of England in gardines." This old author has fortunately pictured the plant in his work, and he observes, that "it is called in barbarous Latin *Balsamina*." Gerard distinguishes

it as the Female Balsam Apple ; but he appears to have been ignorant of its native country, though he observes, “ These plants do prosper best in hot regions : they are strangers in England, and do with great labour and industrie growe in these colde countries.” To which he adds, “ they must be sown in the beginning of Aprill in a bed of hot horse-dung, even as muske-melons, cucumbers, and such like colde fruities are.”

As late as 1656, when the corrected edition of Parkinson’s “ Garden of Pleasant Flowers ” was published, it is stated that “ we have alwayes had the seed of this plant sent us out of Italie, not knowing his original place.” He adds, “ the seed doth seldom ripen with us, especially if the summer be backward, so that we are oftentimes to seek for new and good seede from our friends again.”

It has been observed by some of our best florists that the new seed of the Balsam seldom produces double flowers, and it is recommended to sow seed that has been kept from three to nine years. Fairweather recommends for these plants a rich loamy soil, rather lighter than that used for growing melons ; but the finest plants we have seen in England were grown in the rotten dung of an old cucumber-bed, without any other mixture of earth. The seeds should be sown very thin in pots filled with either of these earths, at any time between the

first of March and the end of April, when they should be placed in a hot-bed, and as near the glass as possible. When the plants are about five inches high, they should be transplanted into pots of the size forty-eight, one plant in the centre of each pot. As soon as the roots have filled the pots, move them into pots a size larger, and repeat this operation three or four times, till, at last, they are in pots of eight inches diameter or upwards, keeping the plants all the while in a hot-bed or pit, and near the glass.

When they are to be transplanted into the garden, they may occupy spots where the roots of Hyacinths, Tulips, or other early-flowering bulbs have been taken up; but some fresh loam or well-rotted dung should be added, so as to force their growth and ensure large flowers. In watering these plants care should be taken not to sprinkle or wet the foliage; and it is recommended to save the seeds from the principal stem only, and not from the collateral branches.

FOX-GLOVE. *Digitalis.*

Natural Order *Luridae. Personae*, Juss. A Genus of
the *Didynamia Angiospermia* Class.

Explore the Fox-Glove's freckled bell.

CHARLOTTE SMITH.

THIS beautiful but deleterious plant, which so highly ornaments the banks of our hedge-rows and the borders of our woods, has been admitted into the pleasure-grounds to embellish the shrubbery by its noble spikes of pendant flowers, which hang with such peculiar grace from the spiral branches that they may be compared to a tower of Chinese bells, balanced for the pleasure of the zephyrs. When these flowers advance from the calyx, they are securely closed at the end by the four clefts of the corolla, which meet so exactly as to prevent the admission of air until the parts of fructification have arrived at their maturity, at which period the lips of the flower burst open in a bell or trumpet shape, displaying the beautiful leopard spots of the interior of the flower. In this state the corolla remains for some days until the anthers have discharged their farina, when the mask drops off, that the sun

may more readily ripen the seed vessels; but, as fresh flowers continue to open in a regular succession upwards from the month of June to September, the beauty of the plant is continued for a longer period than that of most other towering flowers.

The variety of Fox-Glove with white flowers is perhaps one of the greatest enliveners to plantations of evergreen shrubs that can be placed amongst them; and when planted amongst the common laurel, the effect reminds us of a magnified border of Lilies of the Valley.

The white-blossomed variety of the *Digitalis* is not permanent, and we presume it was first obtained through the means of cultivation, or an accidental change of soil, which would be analogous to it, since we have observed that the seeds of this variety, which we sowed some years back, produced numerous plants, all of which blossomed with white flowers. From the seed that these plants scattered numerous young plants sprung up, all of which bore flowers of the common red purple colour; but the seeds that had been saved from the white-blossomed plants, and sowed the following year, gave plants with white corollas. Thus it is clear that some seeds, by being kept out of the ground beyond the course allotted by Nature, lose a part of their natural properties, as we shall notice more fully under the head of the Carnation Poppy.

The Great Yellow Fox-Glove, *Digitalis Ambigua*, is a native of the southern parts of Europe, especially of Germany, chiefly affecting mountainous situations. It is found in considerable quantities on the Alps of Switzerland. Although this is a hardy and ornamental species, which has been cultivated in our gardens since the time of Queen Elizabeth, yet it is but seldom seen at present even in the plantations of the curious.

The Small Yellow Fox-Glove, *Digitalis Lutea*, is indigenous to the shady situations of the stony mountainous places of France, Italy, and also of Transylvania. This species was cultivated in England by Parkinson in 1629.

The Canary Shrubby Fox-Glove, *Digitalis Canariensis*, with gold-coloured corollas, was cultivated in this country by the Duchess of Beaufort in 1698; and the Small-flowered Fox-Glove, *Digitalis parviflora*, was first introduced by Sir Joseph Banks in 1798, who obtained the seed from the botanic garden at Vienna, but from whence it was originally procured is not known to us. This species has the smallest flowers of any of the Fox-Gloves yet discovered, and it has an appearance resembling some of the American heaths when in flower. It is a tolerable hardy perennial plant, that will thrive in any sheltered part of the open garden.

The Madeira Fox-Glove, *Sceptrum*, is a beauti-

ful plant, which frequently grows to the height of ten feet under the cultivation of the florist, in the neighbourhood of Ghent. This species was first discovered in the woods of Madeira by Masson, who introduced it to this country in 1777; but, as it requires the shelter of a green-house for the winter months, it continues rare in our flower-gardens. Our botanical gardens now possess thirteen distinct species of the *Digitalis*, besides varieties.

The *Digitalis*, which, at present, performs so essential a part in the *Materia Medica*, appears to have been entirely unknown to the ancient sons of *Aesculapius*; and it is to the English students of medicine that Europe is indebted for the discovery of the powerful properties of this plant, so justly celebrated for relieving many dangerous complaints: for, although it has fallen short of entirely crushing the gigantic and terrible progress of consumptions, as at one time hopes were entertained that it would have done, yet it has been found a valuable remedy in that disease, as well as in dropsy, fevers, inflammatory affections of the chest, scrofula, &c. But the most remarkable effect which this medicine produces on the human frame, is the diminution of the frequency of the pulsations of the heart, and consequently of the arteries.

The Fox-Glove is decidedly poisonous, and therefore totally unfit for domestic use; and, like

most other powerful medicines, only safe in the hands of a regular practitioner of considerable experience, since death itself has sometimes been the result of the indiscreet use of this deleterious plant. Mr. Waller tells us, "that an increased dose, or too long persisting in a small one, gives rise to the following alarming symptoms—excessive nausea, vomiting, purging, giddiness, and head-aches, with considerable diminution in the frequency of the pulse, sometimes delirium, and at all times great confusion in the functions of the brain." Having noticed these effects, to caution the ignorant against the use of this dangerous plant, we shall now endeavour to amuse our medical readers by the first observations which their brethren made on the *Digitalis purpurea*.

Fuchsius, in his *Plantarum Omnium Nomenclature*, 1541, appears to have been the first writer who distinguished this family of plants by the name of *Digitalis*, from the flowers resembling finger-stalls; and from hence the French called it *Gantelée*, Gloved, and *Gant de Notre Dame*, Our Lady's Glove.

Dr. Turner, who compiled his work on plants during the reign of Queen Mary, and who is the first English writer that mentions this plant, says, "There is an herbe that groweth very much in Englande, and specially in Norfolke, about y^e cony

holes in sandy ground, and in diuers woddes, which is called in English Foxe-gloue, and in Dutch Fingerkraut. It is named of some in Latin *Digitalis*, that is to say Thimble-wurt. It hath a longe stalke, and in the toppe manye floures hanginge doun like belles or thumblies."

Of the properties of this plant, the learned Doctor says, " I haue heard one that sayd that he proued that the whole herbe, stalkes, leues, and floures, brused a litle, and put betwene the horse saddle and his back, is an excellent remedye against the farcye or farsones."

In the succeeding reign the properties of the *Digitalis* seem to have been in some degree discovered, as Gerard, a physician of London, tells us in 1597, that " Foxe-gloue boiled in water or wine, and drunken, doth cut and consume the thicke toughnesse of grosse and slimie flegme and naughtie humours ; it openeth also the stopping of the liuer, spleene, and milt, and of other inward parts.

" The same taken in like maner, or boiled with honied water or sugar, doth scour and clese the breast, ripeneth and bringeth foorth tough and clammie flegme."

Lobelius, a Flemish physician, who settled in England during the reign of James the First, remarks that the country people of Somersetshire, in his time, were in the habit of employing a decoction

of this plant for the cure of fever; and that its operation was exceedingly violent.

Parkinson, an apothecary of London, and herbarist to King Charles the First, tells us, in 1640, that notwithstanding the Fox-glove was found to possess the properties noticed by Gerard, yet there were but few physicians that used it, so that it was generally neglected. This author adds, " And it hath beene of later experience found also to be effectuall against the falling sicknesse, that divers have been cured thereby;" and he relates some extraordinary instances of this disease being entirely cured by the aid of this plant. To this remark, Waller observes in his New Herbal, " It is singular, that since the plant has been so much in vogue, and employed in such a variety of diseases, no experiment should have been made to ascertain its effects in so formidable a disease as epilepsy, which has long been considered the *opprobrium medicorum.*"

The Italians of the seventeenth century used it familiarly to heal fresh wounds as well as to cleanse old sores, and hence their proverb, *Aralda, tutte piaghe salda.* Aralda (Fox-glove) salveth all sores.

Dr. Withering, who has the credit of bringing the attention of our medical practitioners to the notice of this plant, observes that in dropsical cases

it seldom succeeds in men of great natural strength, tense fibre, warm skin, and florid complexion; or in a tight cordy pulse. If the belly in ascites be tense, hard, and circumscribed, or the limbs in anasarca be solid and resisting, we have but little hope. On the contrary, if the pulse be feeble, or intermitting, the countenance pale, the lips livid, the skin cold, the swollen belly soft and fluctuating, the anasarcaous limbs readily pitting under pressure of the finger, we may expect the diuretic effects to follow in a kindly manner.

It is only within the present age that the continental physicians have used the Digitalis as an internal medicine. But within these last few years it has come into such high repute with the Parisian apothecaries, that they frequently ornament the outside of their houses with paintings of this flower on their door-posts, or on the piers between their windows.

As the Digitales which are natives of this country are either of a purplish red colour or perfectly white, we are at a loss to account for the origin of the name of Fox-glove, unless it were from its growing abundantly in situations and soils where foxes generally earth. Our early poets notice it under this name only. Cowley says:

The Fox-glove on fair Flora's hand is worn,
Lest while she gathers flowers she meet a thorn.

The light down which covers the stalks of the Fox-glove induced the poets to make this plant the emblem of youth; but others, in allusion to its flowers, which offer some resemblance both to the cap and the bells, have made it the emblem of folly.

POPPY. *Papaver.*

Natural Order *Rhaeadeæ. Papaveraceæ*, Juss. A
Genus of the *Polyandria Monogynia* Class.

And Poppies, which bind fast escaping sleep.

COLUMELLA.

From the Poppy I have ta'en
Mortal's balm, and mortal's bane !
Juice, that creeping through the heart,
Deadens ev'ry sense of smart ;
Doom'd to heal, or doom'd to kill,
Fraught with good, or fraught with ill.

MARY ROBINSON.

HAVING already published a history of this somniferous plant at considerable length in the History of Cultivated Vegetables, we have now only to notice those different species and varieties which are employed to embellish the parterre of Flora; first observing, that as these plants are made to ease the pains and to procure sleep to the restless invalid, the Poppy in floral language is made the symbol of consolation.

To show that Poppies were cultivated to ornament the royal gardens of Rome in the early days of that city, we have only to call the attention of our readers to the interview which took place

between Tarquin the Proud and the messenger who was sent by his son from the city of Gabii.

The Carnation Poppy, which adds so considerably to the gaiety of the garden during the months of July and August, and which is so much cultivated in France, and so greatly neglected in England, is a variety of the common Poppy of our corn-fields, *Papaver Rhæas*. In its double state it is a flower of great beauty, both on account of its crumpled and delicate texture, elegance of shape, and variety in colouring, some being perfectly white, others plain rose, blush, scarlet, or crimson, and on others the pencil of nature seems to have blended the dyes in the most finished style of colouring, with petals thin as gossamer and double as the rose. This flower bursts out of its confinement at maturity with considerable force, throwing off the two-leaved caducous calyx to some distance, and astonishing the beholder who sees so large and so beautiful a corolla escape from so small a dwelling. The petals are frequently white, with a delicate edging of scarlet or rose-colour, or red petals with white edges, so variously diversified that two plants are seldom alike in their flowers.

With what delight and amazement do we frequently regard the ingenuity of the mechanic when he displays the movements of a watch, or a musical box encompassed in a case of diminutive size; but

the most complete and costly of these baubles are as inferior to the works which nature has employed on the Poppy, as the clumsiest wheel of a country wheelwright is to the finished mechanism of the most celebrated watch-maker.

The calyx of the Poppy not only shuts in the numerous and large petals of the flower with its innumerable chives bearing their anthers on points as fine as hairs, each anther containing an incalculable number of fertilizing particles, but it also contains the capsule, which in itself cannot be examined without exciting our utmost admiration of the wisdom with which it has been formed by the Universal Creator. The capsule is covered by a shield-formed stigma thickly perforated, so as to admit the fecundating particles of the farina to the channels which are so disposed around the eleven cells or chambers of the capsule, that each seed receives its regular portion of this matter by means of an umbilical cord, notwithstanding that there are frequently six thousand of these vegetable eggs contained in one capsule. When we reflect that each of these small seeds is so admirably perfect in its minute dimensions as to contain all the essentials necessary to form a plant on the following year, which is destined to produce at least twenty capsules, we must exclaim with Pope,

— How wondrous are thy ways !
How far above our knowledge and our praise !

We were so much attracted by the beauty of the Carnation Poppy in the gardens of the Tuilleries, at Paris, during the summer of 1818, that we procured some of the seed and brought it to England, which on sowing in the following spring produced the gay variety of double flowers that had so much pleased us in the royal gardens of France. From these plants we obtained a good supply of seed ; but perceiving abundance of young plants springing up from the self-sown seed, we omitted to sow seeds, excepting in a small spot at a distant part of the garden, which again produced the same beautiful double flowers, whilst all the plants from the self-sown seed blossomed with single flowers, except a few plants with semi-double, but the beautiful edging and varieties in colour were the same. These plants were again permitted to scatter their seed, and the plants were on the succeeding summer so far returned to their natural state as not to be distinguishable from the common Red Poppy of the corn-fields, from which it may be inferred that some kinds of seeds being kept out of the earth beyond the time allotted by nature, become weakened so as to lose a part of their natural properties, and thus produce flowers which the botanist rejects as monsters, from their being out of nature, whilst the florist exults over the change which his art has

assisted to produce. We have before noticed that to secure the Balsam in a double state, the seed should be kept for some years before it is sown.

The common Corn Poppy, where it abounds, denotes a light and shallow soil, and it is singular that when such land is broken or ploughed up in the spring, when there can be no Poppies to scatter their seed, and although it be where none have ever been seen, yet it is a great chance that such land shall not be covered with these plants during the summer. We have frequently observed this phenomenon on the South Downs of Sussex, when lands have been first broken up ; and even in situations distant from other corn-lands, we have seen the plains glow with the red petals of the Wild Poppy.

The ancients thought the *Rhaeas*, Corn-Rose, so necessary for the prosperity of their corn, that the seeds of this Poppy were offered up in the sacred rites of Ceres, whose garland was formed with barley or bearded wheat interwoven with Poppies. An antique statue of this goddess, at the Louvre, at Paris, (No. 295,) represents Ceres as holding Poppies in her hand mixed with corn, as well as having them braided in her hair. And in the same collection, (No. 593,) *Sabina* holds a cornucopia filled with Pomegranates, Grapes, and Poppy-

heads. Poppy seeds were frequently mixed in the food of the ancients, strewed over their bread, and also sent to table mixed with honey.

The Persians still continue to sprinkle the seeds of Poppies on their rice and wheaten cakes, which is also frequently practised in Germany, where the seeds are given as a cooling diet to singing-birds.

The Carnation Poppy will thrive in any soil or situation; but M. Pirolle tells us that the seeds should only be gathered from the most double kinds, and that the capsules should be taken from the centre stalk of the plant only.

This kind of Poppy is well adapted to ornament newly-planted shrubberies, or the foreground of larger flowering shrubs, as also to give a gaiety to those parts of the parterre where the early flowers have decayed.

THE EASTERN POPPY. *Papaver Orientale*.

This splendid Poppy was discovered by Tournefort, in Armenia, from whence he sent the seed to the royal garden of plants at Paris, from which place it was distributed to other parts of Europe, and was cultivated in this country prior to 1714, by Mr. George Loudon.

This is a perennial plant which is easily propagated by dividing its creeping roots in the autumn; and although it is a native of the East, it bears the severity of our winters without injury, particularly when planted in a dry soil. The seeds of this species of Poppy should be sown as soon as ripe, in pots filled with a rich and fresh loam. These pots require the protection of a greenhouse or frame for the winter months; and in the following spring the young plants may be transplanted into a bed or other pots, and removed again in the autumn. This Poppy rather belongs to the spring than the summer, since it generally flowers in May. From its magnificence both in size and colour, it belongs rather to the foreground of the shrubbery than to the borders of choice flowers. The petals are generally of a bright red, with black rays at the base, but they sometimes vary to a reddish orange-colour. It is no small recommendation to this plant that it flowers freely under the shade of trees, as we have but few plants that blossom in the shade with a red flower.

The Papaver Bracteatum,

Which first flowered in this country in the Botanical garden at Chelsea, in 1820, is one of the most

ornamental Poppies that we have seen ; and as it is a hardy perennial, it cannot fail of becoming a favourite plant in the pleasure garden, where its large and brilliant coloured flowers are scarcely less conspicuous than the Peony.

THE NAKED-STALKED OR NORWAY POPPY, *Papaver Nudicaule*,

Which produces a yellow flower, with a fragrance similar to that of the Joaquin, especially in the morning and evening, is a hardy perennial plant, raised from seed sown either in the autumn or the spring. This species was first cultivated in England in 1790. The seed was procured from the eastern confines of the Russian empire, from the province of Argunsky, in Siberia, in lat. 51, from whence they were sent by Heidenreich, and forwarded to the Eltham garden by J. H. de Heidenreich. The flowers of this species continue in succession from June to August, and they sometimes vary to a pure white.

To our History of the White Poppy *, *Papaver Somniferum*, and the dangerous drug which is produced from it, we have but little to add, unless

* *History of Cult. Veg.*, Vol. ii.

we quote Drayton as an additional caution to those we have already given :

Here Henbane, Poppy, Hemlock here,
Procuring deadly sleeping :
Which I do minister with fear ;
Not fit for each man's keeping.

The quantity of opium consumed in this country annually is about fifty thousand pounds, and it is now made in this country quite equal in all its deadening and dangerous qualities to the best which can be procured from Turkey.

Messrs. Cowley and Staines, of Winslow, Bucks, procured, in the year 1821, sixty pounds of solid opium from rather less than four acres and a half of land. The seed was sown in February, and the gathering commenced in the latter end of July, when the Poppies had lost their petals, and were covered with a bluish-white bloom.

Opium having found its way into China, is become almost a necessary of life with the Chinese, yet its importation is strictly confined to Canton. We most earnestly hope that its use will never get out of the hands of the medical practitioners in this country ; for where it does not kill, it enervates the constitution, and deadens all lively energies by its malignant influence, until it changes the character of a whole country.

In the time of Gesner, the village Damons and

Phillises proved the sincerity of their lovers by placing a petal of the Poppy in the hollow of the palm of the left hand, which, on being struck by the other hand, gave a sound that denoted true attachment, or faithlessness when it failed to snap.

By a prophetic Poppy-leaf I found
Your changed affection, for it gave no sound,
Though in my hand struck hollow as it lay,
But quickly wither'd like your love away.

YELLOW DAY LILY. *Hemerocallis Flava.*

Natural Order *Liliaceæ* and *Coronarieæ*. *Narcissi* and *Asphodelæ*, Juss. A Genus of the *Hexandria Monogynia* Class.

Aux feux dont l'air étincelle
S'ouvre la belle de jour ;
Zéphyr la flatte de l'aile :
La friponne encore appelle
Les papillons d'alentour.

Coquettes, c'est votre emblème :
Le grand jour, le bruit vous plaît,
Briller est votre art suprême ;
Sans éclat, le plaisir même
Devient pour vous sans attrait.

PHILIPON DE LA MADELEINE.

THIS fragile beauty is made the emblem of coquetry, because its flower seldom lasts a second day. The generic name is derived from the Greek 'Ημέρα, a day, and Κάλλος, beauty, and hence the French name it *Belle d'un jour*. Tournefort called it *Lis-Asphodel*, because the plant has the root of an Asphodel, and the flower of a Lily.

This species of *Hemerocallis* is a native of

Hungary, Siberia, and the northern parts of China. M. Pirolle tells us that it is also indigenous to the damp forests of Piedmont. Both the Yellow and the Copper-coloured Day Lilies are old inhabitants of our gardens, since Gerard says in 1596, that "these Lilies do growe in my garden, and also in the gardens of herbarists and louers of fine and rare plants." This excellent old writer distinguishes these Lilies by the title of *Lilium non bulbosum*, the root being partly fibrous and partly tuberous, and not bulbous like other Lilies. Parkinson writes on the Yellow Day Lily, under the name of *Liliaspheodelus*, from its root resembling that of the Asphodel; and he tells us that it grows naturally in many moist places in Germany.

The Yellow Day Lily flowers in June, and although the blossoms are not durable, they are followed by others in succession, so that the plant continues to display its beauty, and to give out its agreeable fragrance for a considerable length of time, and more particularly so when planted in a moist soil and a situation somewhat shady. It is an admirable flower for the vase of the saloon, as its graceful corollas, being supported on an erect stem, show to peculiar advantage when towering above roses or lilacs.

This plant is of a hardy nature, and of easy propagation, being increased by numerous off-sets from the roots, which should be removed about every third year in the autumn, observing to keep them out of the earth as short a time as possible. The Yellow Day Lily is also raised from seed, which, when sown in the autumn on an open bed, sends up young plants in the spring, which generally flower the second year. These plants require considerable room for their roots to spread, and they make a fine appearance when in large clumps amongst flowering shrubs.

The Copper-coloured Day Lily, *Hemerocallis fulva*.—This plant frequently grows to the height of four feet, and is therefore better calculated to ornament the shrubbery than the parterre. It flowers in July and August; and although the corollas wither at the close of the same day on which they expand, yet the plant continues gay for nearly three weeks, from the succession of flowers that follow each other daily. This species is a native of the Levant, and is found also in some parts of the south of France. Gerard called it *Lilium non bulbosum Phœniceum*. It, requires the same treatment as the Yellow Day Lily, but never ripens its seed in this country.

The White flowered Day Lily, *Hemerocallis*,

Japonica, and the Blue-flowered, *H. cærulea*, are natives of Japan, and were introduced to our gardens in the year 1790. The latter may be seen pictured in the Botanical Magazine, 894, and the former at page 1433 of the same valuable work.

ADONIS. *Adonis.*

Natural Order *Multiniliquæ*. *Ranunculaceæ*, Juss. A
Genus of the *Polyandria Polygynia* Class.

Je n'ai jamais chanté que l'ombrage des bois,
Flore, Echo, les Zéphyrs et leurs molles haleines,
Le vert tapis des prés et l'argent des fontaines.
C'est parmi les forêts qu'a vécu mon héros ;
C'est dans les bois qu'amour a troublé son repos.
Ma muse en sa faveur de myrte s'est parée ;
J'ai voulu célébrer l'amant de Cythérée,
Adonis, dont la vie eut termes si courts,
Qui fut pleuré des Ris, qui fut plaint des Amours.

LA FONTAINE.

“ ADONIS stained with his blood the flower that bears his name,” and hence in floral language it is made the emblem of sorrowful remembrances, although some poets make it symbolical of the chase, in allusion to his love of hunting. This idea inspired a modern Venus, whose swain was passionately fond of the chase, to deplore his absence in the following pretty lines :—

O fleur, si chère à Cythérée,
Ta corolle fut, en naissant,
Du sang d'Adonis colorée.
Hélas ! à ta vue, égarée,
Je frémis pour mon jeune amant.

That this flower owes its name to the favourite

of Venus is not to be disputed, but whether the goddess of beauty changed her lover into this plant or the Anemone would be difficult to decide, since the Linnæan system of dividing plants into families did not exist when the gods and goddesses made love upon earth, and previous to the time of the Swedish botanist the Adonis was considered to be one of the Anemonies, which it greatly resembles.

The Pheasant's-eye, *Adonis autumnalis*, is evidently a native flower of our corn-fields, since Gerard observes, as long back as 1596, that "the red flower of Adonis groweth wilde in the west parts of Englannde, among their corne, euen as Maie-weede doth in other parts, and is likewise an enimie to corne as Maie-weed is, from thence I brought the seede, and haue sowne it in my garden for the beautie of the flower's sake." Both Ray and Martyn seem to have overlooked this account, as they say it is a native of most of the southern parts of Europe. Though now common in corn-fields with us near London, yet not being mentioned as indigenous by any of our old writers, it is probably of no very long standing, and was originally conveyed from gardens by the intervention of the dung-heap.

" It grows in Kent, particularly by the side of

the river Medway, between Rochester and Maidstone, where it is found in great plenty, in the fields, sown with wheat. Among spring corn there is rarely a plant of it to be found; which shows the propriety of sowing the seeds in gardens in autumn; for those fields of spring corn, if suffered to remain undisturbed after the harvest, will abound with this plant the following year. Great quantities of the flowers are annually brought to London, and sold by the name of *Red Morocco*."—(Martyn.) Gerard tells us that in his day the country people called it " Red Camomill, and the London women do call it Rosearubie." It is now generally termed Pheasant's-eye, from the resemblance the flower bears to the beautiful eye of that bird.

The seed of this hardy annual plant should be sown in the autumn, for when sown in the spring the plants seldom appear until the second year, but the plants that spring from the self-scattered seeds are generally the finest, which should teach us not to bury the seed too deep in the earth. They should also be sown in patches of some size, and when the plants are a few inches high they may be thinned out, leaving several in each patch, but they will not succeed when transplanted, unless taken up with the earth when very small.

The Red Adonis flower thrives best in a light soil, but by sowing some seeds amongst shrubs in a shady situation, the flowers will be so far retarded as to succeed those in more sunny situations, and thus the duration of those little ruby roses will be prolonged.

CENTAURY. *Centaurea*.

Natural Order *Compound Flowers*. *Cinarocephala*,
Juss. A Genus of the *Syngenesia Polygamia Frus-*
tranea Class.

To cure the bees, dried Roses, Acorn juice,
Athenian Thyme and Centaury conduce.

VIRGIL.

OUR botanical gardens possess no less than seventy-two distinct species of this genus of plants, besides varieties, all of which are natives of the Old World, not one having, to our knowledge, been discovered in either of the Indies or America. Like the Common Poppy, the Centaury is the corn-flower of all the European countries, as well as that of Persia, Egypt, Siberia, Tartary, and Barbary; and although the species of this very extensive genus vary considerably in character, yet they all seem to harmonize with the Red Poppy and the yellow corn as happily as the Bluebottle of our British fields mixes with the gay Poppy in the fields of Ceres.

The generic name of these plants is derived from Κένταυρος, a centaur; and fabulous history adds, that it was so called after Chiron, a centaur, who

taught mankind the use of plants and medicinal herbs. It is also related that he cured a wound, which was inflicted by a poisoned arrow of Hercules', by the aid of one of the species of these plants, from which circumstance it was called Centaury.

Ancient fable informs us, that the Bluebottle of our corn-fields was called *Cyanus*, after a youth so named, who was so devoted to corn-flowers, that his chief employment was that of making garlands of them : and he seldom left the fields so long as his favourite flower was to be found, always dressing himself in the same fine blue colour of the flower he so much admired. Flora was his goddess, and of all her gifts this was the one he most admired. At length, he was found dead in a corn-field, surrounded with the Bluebottles he had gathered ; soon after which Flora changed his body into this flower, out of gratitude for the veneration he had for her divinity.

The Bluebottle, *Centaurea Cyanus*, has been taken from the fields to the garden, where the art of the florist has multiplied its florets, and varied its colour so much, that it is now become one of the summer favourites of the parterre, flowering from the middle of June to the end of September. In its natural wild state the flowers are of a fine ultramarine blue, and hence it was, we presume, ori-

ginally called Blueblow. Dr. Turner calls it Blewblawe in 1564, as well as Blewbottle ; and the latter appears a corruption from the former, since there is nothing in the shape of the flower that can possibly remind us of a bottle. Dr. Turner observes, that "some herbaries call it *Baptisecula*, or *Blaptisecula*, because it hurteth sicles, which were once called of olde writers *Seculae*."

Gerard observes, that it is called " Blewebottle, Bleweblow, Corneflower, and Hurtsickle." He adds, " it is sowen in gardens, which, by cunning looking to, doth oftentimes become of other colours, and some also double." In Scotland it is called Blue Bonnets ; in German, Dutch, Swedish, and Danish, *Kornblume* ; in French, *Bluet* ; in Italian and Portuguese, *Ciano* ; in Spanish, *Aciango Azulejo*.

A beautiful blue, almost equal to ultramarine, may be obtained from the *Cyanus*. After collecting a quantity of these flowers, pick out the petals or florets from the centre of the flower, which are of a darker blue than those of the outside, and pound them whilst quite fresh in a glass or marble mortar so as to obtain the juice, to which add a small quantity of alum, and then put it into clean shells for use. The outer florets give a blue of a paler colour.

The *Cyanus* is a hardy annual plant, that will

grow in almost any soil, but it succeeds best when sown in the autumn, for those sown in the spring seldom produce so many flowers, and it is a plant that will not bear transplanting. The only care required is to keep the plants free from weeds, and to thin them to a proper distance from each other, as they branch to a considerable distance.

SWEET SULTAN, OR PURPLE SWEET CENTAURY. *Centaurea Moschata.*

This honey-scented species of *Centaurea* is indigenous to the soil of Persia, and was first introduced to this country during the reign of Charles I. Parkinson thus speaks of it in 1629: "As a kinde of these corne-flowers, I must needs adjoyn another stranger, of much beauty, and but lately obtained from Constantinople, where, because, as it is said, the great Turk, as we call him, saw it abroad, liked it, and wore it himself, all his vassals have had it in great regard, and it hath been obtained from them by some that have sent it into these parts."

Parkinson adds, "this flower hath been sent by the name of *Ambreboi*, which, whether it be a Turkie or Arabian name, I know not. I have

called it from the place from whence we had it, *Turcicus*. The Turks themselves, as I understand, do call it the Sultan's Flower, and I have done so likewise, that it may be distinguished from all the other kindes."

It is frequently called Blackamoor's Beauty and Honey-flower; and although a native of warmer climates, it is sufficiently hardy to stand this climate, and produces the strongest plants when the seed is sown in the autumn, yet we recommend that some of the seed should be always sown in the spring, so as to obtain the flowers to the end of summer.

The Yellow Sweet Sultan is a tender variety of this species of Centaury ; therefore it is necessary to raise the plants by sowing the seed upon a hotbed in the spring, from which they should be removed into separate pots when of a proper size, and forwarded by plunging them into other hotbeds until they have taken good root, after which time they should be gradually accustomed to the air, so as to harden them for the parterre of the open garden, where they will continue in beauty for a great length of time.

Both the Sweet Sultan of the Turks and the Bluebottle of Britain are made the emblem of felicity, in floral language.

**ROSEBAY WILLOW HERB, OR FRENCH
WILLOW.** *Epilobium Angustifolium.*

Natural Order *Calycanthemæ*. *Onagræ*, Juss. A Genus of the *Oclandria Monogynia* Class.

THIS beautiful rustic plant, so ornamental in landscape-gardens by its tall spikes of showy flowers, is admirably adapted to embellish the banks of our streams, the foreground of our woods, and wilderness scenery in general, since its amaranth-coloured calyx and its amethyst-tinted corolla contrast as happily with the blue waters of the lake, as agreeably with the green foliage of the forest. There is an elegance in the rusticity of this plant, and a liveliness in its flower, that are seldom surpassed by the choicest gifts of Flora; yet it has been too generally rooted out of the parterre, without being admitted into more suitable situations. Its rapid increase by its creeping root, renders it unfit for the quarters of choice plants, as well as its height, which is usually from four to six feet; but these objectionable qualities in the flower-garden are admirable properties in other situations, which should be made subservient to the pleasure-grounds; and we

must here observe, that the beautifying of our landscapes by floral assistance has been hitherto but too little regarded.

The generic name of this plant is derived from the Greek επις λοβου τον, which expresses a violet upon a pod, for the reddish violet-coloured flower is seated in a singular manner on the extremity of a long pod of the same colour; and it is regarded as a rare instance of the name expressing an essential character of the plant.

It is called Willow Herb, from the resemblance which its leaves bear to those of the *Salix*, or Willow, and French Willow, we presume, from its being originally brought from that country; for although it is now generally considered to be indigenous to this island, we have considerable doubts about claiming it as an aboriginal of our soil.

Parkinson describes this plant, in the year 1629, under the title of *Chamaenerium Flore Delphinii*, the Willow-flower; and he observes, "We have not known where this Willow-flower groweth naturally, but we have it standing in an out corner of our gardens to fill up the number of delightful flowers."

It was very natural to consider this flower to have belonged to the family of *Delphinium*, since the flower-buds so much resemble those of the Single Larkspur.

Gerard describes this plant as long back as 1596, calling it a “ goodly and stately plant, having leaves like the greatest willow, or ozier. The branches come out of the ground in great number, growing to the height of sixe foote, garnished with braue flowers of greate beautie, consisting of fower leaues a-peece, of an orient purple colour.” He adds, “ it groweth in Yorkshire, in a place called the Hooke, neere vnto a close called the Cow-pasture, from whence I had these plants, which do grow in my garden very goodly to behold, for the decking vp of houses and gardens;” but he does not mention its having been found in any other part of this island.

As it is upon Mr. Miller’s authority principally that later botanical writers have considered this plant to be indigenous to England, we shall notice what he has said upon the subject, which we think rather contradicts the idea than supports it. In his first edition of “ The Gardener’s and Florist’s Dictionary,” which was published in 1724, he writes of this plant under the title of the French Willow only, and does not insinuate that it grew naturally in this country ; but observes, “ If these plants be set in wilderness works, they will soon overspread the ground, but if they are designed to adorn parterres, the roots must be confined in pots.” In his sixth edition (1762) he observes, “ This

plant was formerly planted in gardens for the beauty of its flowers ; but, as it usually spreads far by the creeping roots, whereby it overrun all the neighbouring plants, it has been cast out of most gardens ; but in some low moist places, or in great shade, if there was a place assigned for this plant, it will make a good appearance when it is in flower, and these flowers are very proper to cut for basins to adorn chimnies in the summer season." He adds, " This plant is found wild in divers parts of England : but several botanists have supposed it was only found in such places where the plants had been cast out of gardens : however, I think it must be allowed to be a native of this country, since it is found in great plenty in woods at a great distance from any habitation, particularly in Charlton-Forest, and several other woods, in Sussex. It is a great creeper at the root—so may be easily propagated."

To us it seems most probable, that when it was expelled from the garden, it was carried into the woods by some accidental circumstance ; for, had a plant of such a rapid propagation been originally a native of our woods, it could not have escaped our observation, and we have never found it in any situation where it seemed to be indigenous. It is a native of most parts of the continent, from Italy to Lapland, but is found more abundantly in Switzer-

land and France than in any other country. In France it is called *Epilobe à épi*, *Osier Fleuri*, and *Laurier Saint Antoine*; and as St. Anthony was the founder of monastic institutions, we have made his favourite plant the emblem of celibacy.

The French Willow prospers best in a moist soil, and it will succeed in shady situations. It is so easily propagated from the runners that it is unnecessary to raise it from seed; the only art required in its cultivation is to keep the roots within due bounds. This plant would be a great ornament to our hedgerows, where we hope to see it flourishing, in order that it may more frequently fall under the notice of modern poets, for it appears to have been hitherto entirely neglected by the bards of our country.

FRENCH HONEYSUCKLE. *Hedysarum Coronarium.*

Natural Order *Papilionaceæ* or *Leguminosæ*. A Genus of the *Diadelphia Decandria* Class.

Pales, the pasture's queen, where'er ye stray
Pursues your steps delighted, and the path
With living verdure clothes. Around your haunts
The laughing Chloris with profusest hand
Throws wide her blooms.

AKENSIDE.

THIS species of *Hedysarum*, which we have so improperly named after a country that it does not belong to, and after a flower to which it has no resemblance, is a native of Spain, and also of some parts of Italy. It is the Saint-foin of the Spanish fields, affording nourishment to their cattle in the same manner as the Saint-foin and Clover of our pastures assist to support our herds.

The French call this plant *Sainfoin à bouquet* and *Sainfoin d'Espagne*. But this Holy-Hay of the Spaniards does not appear to have been made an object of agricultural experiments in other countries, although its hardy nature and luxurious growth is sufficient to have induced the trial.

In Calabria it grows wild in great luxuriance,

near four feet high, affording excellent nourishment to horses and mules, both green and when made into hay ; and we earnestly recommend a trial of its use in husbandry in this country, particularly to those farmers whose lands are situated on chalky downs or hills where there is frequently a want of green fodder for cows, as it is well known that since the introduction of Saint-foin and Lucerne, many dairies have been set up, where these were formerly thought impracticable. The cows which are fed on the French Honeysuckle in Italy and Spain produce abundance of milk, and the butter made from it is good flavoured.

It has long flourished in the British parterre, having been known in this country previous to the year 1596.

Parkinson calls it "The Red-flowered Fitchling, and the Red Satin-flower," and observes, "some foolishly call it the Red or French Honeysuckle."

The generic name of this plant is derived from the Greek, Ἡδύσμα, sweetness, and ἄρω, ointment. It is considered a biennial plant, but it grows stronger and becomes perennial if cut down before it seeds. It flowers in June and July, in spikes of papilionaceous flowers of a rich red colour and satin-like appearance ; but the large straggling nature of the plant makes it more calculated to ornament the

shrubbery than to embellish the flower borders. Miller recommends the seed of the French Honey-suckle to be sown in the month of April, in a bed of light fresh earth, and when the plants come up, they should be transplanted into other beds of the like earth, and in an open situation, at about six or eight inches' distance from each other. In these beds they may remain until Michaelmas, when they may be removed into the situations where they are intended to flower, observing that each plant will require a space of three feet each way from other plants.

In the language of flowers, the French Honey-suckle is made the emblem of rustic beauty.

CISTUS or ROCK-ROSE. *Cistus.*

Natural Order *Rubiaceæ*. *Cisti*, Juss. A Genius of the
Polyandria Monogynia Class.

With what enchantment Nature's goodly scene
Attracts the sense of mortals !

AKENSIDE.

UNDER the title of Cistus is comprised an extensive genus of plants, all equally celebrated for their beauty and their fragility. These favourites of Flora are of so transient a nature as always to end their existence with the same sun that gives them birth ; but as they have a great profusion of flower-buds, this imperfection is the less regarded, since as some wither others expand, so as to keep up a succession of gaiety for a considerable length of time, embellishing this spray to-day and that to-morrow.

In floral language we have placed the Cistus as the emblem of popular favour, since the duration of the one cannot be relied on more than the continuance of the other.

Aiton enumerates forty-three distinct species of Cistus in the *Hortus Kewensis*, seven of which are claimed as native plants by the British botanist.

The Dwarf Cistus, or Little Sunflower, *Cistus Helianthemum*, is one of the most beautiful flowers that graces our chalky hills and gravelly banks during the months of July and August. In calcareous soils these flowers are generally of a bright yellow or lemon colour, but in sandy grounds we have frequently found them of a fine rose-colour, and sometimes of a dingy reddish yellow. The variety with white petals is usually found on gravelly banks, and we have observed that this species of *Cistus* is generally found flourishing on banks or hills that have an eastern aspect; a remarkable instance of which may be seen at the Devil's Dyke, near Brighton, where, on the bank of the dyke which faces the east, thousands of these beautiful little flowers may be seen spangling the turf with their yellow petals, whilst on the opposite bank, which has a western aspect, not a single plant of the *Cistus* is to be found. All the species seem to love a dry soil and a clear and pure air. The *Cistus Helianthemum* is a perennial plant that sends out long trailing branches, and when planted on poor dry soil, will continue for several years, but when planted in rich or moist ground, seldom survives a second year. Few plants are better calculated to ornament rockwork or gravelly banks than this native, particularly when all the varieties

of colours are collected on one spot; for, as Aken-side observes,

In colours mingled with a random blaze,
Doth beauty dwell.

The corolla of the Cistus consists of five roundish petals, that are large in comparison to the size of the plant, and which burst from the confinement of the small calyx with such velocity, that although they instantly expand to a horizontal position, their crumpled petals never become smooth, which circumstance forms a general character in nearly all the species. This and their numerous stamens add greatly to the delicacy and beauty of the flower, as there are generally from ninety to a hundred anthers surrounding each style. These plants may be raised from seed sown on the spot where they are to remain, and they can also be propagated by cuttings or layers, which is the most desirable mode of propagating the white and rose-coloured varieties, as they are not always permanent when obtained from seed.

The greater number of the Cistus tribe are natives of the south and warm parts of Europe, and are always found in dry sheltered situations, but never in the shade. We have hitherto seen no species of the Cistus from China or the Indies, and but one from America, and two from the Canary Islands. The oblong-leaved Cistus, *Vagi-*

natus, which was procured from Teneriffe, where it is indigenous, is the most beautiful species yet discovered, and forms one of the most elegant of all the hardy green-house plants known, growing from four to five feet in height, and producing in the months of May and June numerous branches of rose-coloured flowers about the size of the common field Poppy. The foliage of this species has an agreeable balsamic smell. It is easily propagated by seeds, layers, and cuttings; and as we do not despair of its becoming, when more accustomed to our climate, sufficiently hardy to endure our winters, we recommend it particularly to the notice of the British florists. The Hortus Kewensis gives Mr. Mason the honour of first introducing this plant in the year 1779; but in Lamarck's Encyclopædia, it is mentioned as having been sent to the Royal Botanic Garden at Paris, by our celebrated countryman Sherard, which would make its introduction nearly fifty years earlier than the time stated by Mr. Aiton.

The Hoary, or Rose Cistus, *Incanus*, is also a most beautiful species; but being a native of Spain and the South of France, it has hitherto been found to require some protection during the winter months, excepting when planted in warm and sheltered situations.

The history of the Gum Cistus, *Ladaniferus*

will be found in the *Sylva Florifera*; and for a knowledge of the remainder of these beautiful plants we must recommend the inspection of the botanical works with coloured plates, since nothing short of coloured drawings can give a just idea of their numerous varieties and varied beauties.

The Cistus appears to have been a favourite flower even in the infancy of British gardening, since Gerard has left us representations and descriptions of no less than thirty-eight kinds that were cultivated in the time of Queen Elizabeth.

The generic name of these plants is of great antiquity, since the fables of the Greeks inform us that it was called *Kιστος*, after a youth named Cistus; but naturalists suppose it to have been so named from the seed being enclosed in a *cista*, or capsule. Gesner, and several writers of his age, classed the larger kinds amongst the roses, calling them *Rosa Alpina* and *Rosa Montana*. Parkinson writes of them under the title of *Cistus*, The Holly Rose.

EVERLASTING, OR CUD-WEEDE.*Gnaphalium.*

Natural Order *Compositæ Discoideæ. Corymbiferæ*
Juss. A Genus of the *Syngenesia Polygamia Super-*
flua Class.

As gather'd flowers, while their wounds are new,
Look gay and fresh as on the stalk they grew,
Torn from the root that nourish'd them awhile,
(Not taking notice of their fate) they smile.
And in the hand that rudely pluck'd them show
Fairer than those that to their autumn grow.

WALLER.

We present this lasting flower as the emblem of never-ceasing remembrance, from its being so frequently used on the continent to decorate the monuments and graves of departed friends. Since the hill of Père la Chaise has been converted into a cemetery for the city of Paris, the demand for these flowers in the French capital has been so considerable, as not only to employ many hands in the cultivation of them, but numerous families are regularly occupied and entirely supported by forming these flowers into garlands and crosses, which are offered for sale by the cottagers near the entrance

of this celebrated burial ground ; and but few persons can visit the romantic and hallowed spot without having some name called to their remembrance which draws from them this slight token of remembrance : for here we find a mingled mass of monuments, recalling to our recollection the sweet lines of the poet, the ready wit of the critic, the piety of the priest, the heroic deeds of the soldier, the bravery of the sailor, the labours of the naturalist, the beauties of the artist, the mimickry of the actor, and the loves of Abelard and Heloise : here we meet fond parents with wreaths of *Immortelles* to drop on the sod of their blighted hopes, and affectionate children placing crosses of Everlasting flowers on the head of their parents' graves.

Affliction and sorrow come here to indulge in sadness and meditation, for the cheerful inhabitants of the gay city below Père la Chaise are not less susceptible of the feelings of paternal affection, brotherly love, and friendly regard, than those dwelling in less sprightly towns.

The Everlasting flower, which the French call *Immortelle*, is not consigned alone to the use of the grave, since we frequently meet with it ornamenting the vase of the saloon, for which purpose it is frequently dyed of various colours, and sometimes variegated in so skilful a manner as to deceive the purchaser into the belief of its being so coloured

by nature. Great quantities of these dried and stained flowers have of late years been imported into this country, for the purpose of decorating the head-dresses of our belles, as well as ornamenting our chimney-pieces; for although it is a plant of long standing in our gardens, its cultivation has never been attempted on a large scale for the market.

The ancients crowned the images of their gods with garlands made of these flowers, and from hence they were frequently called God's Flowers. In Spain and Portugal they are still used to decorate the altars and the images of the Saints.

The generic name of this genus of plants is derived from the Greek γναφαλον; and the Latins also called them Gnaphalium, from the downy or cottony nature of the leaves or stalks, which they collected to fill their couches and mattresses, instead of wool or flocks. Pliny tells us that it was also called Chamaezelon, which signifies low or ground cotton; and it was sometimes named Albium, from the whiteness of the leaves and stalks.

We possess five native species of these plants, which Dr. Turner observes was called Cud-weed in Yorkshire, whilst in Northumberland it was named Chafe-weed, because it was used to cure chafed flesh. In addition to these names, Gerard adds that of Cotton-weed; and speaking of the

.*Gnaphalium Alpinum*, he says, “the flower being gathered when it is yong, may be kept in such manner as it was gathered; I meane in such freshnesse and well liking, by the space of a whole yeere; wherefore our English women haue called it Liue-long, or Liue-for-euer, which name doth aptly answer his effects;” and from hence the name Everlasting has originated.

At what exact period the Eastern Everlasting, *Gnaphalium Orientale*, was first cultivated in this country cannot be ascertained, but we may fairly conclude that it was soon after the year 1597, as we learn from Gerard’s Herbal, which was published in that year, that the plant in its dried state had then been sent to this country, and from the earnestness shown in that age for the collecting of exotic plants, there can be no doubt but that it was soon afterwards obtained for the parterres of London; but we have no author who speaks of its cultivation before Parkinson, from whom we learn that it was an inmate of our gardens prior to 1628. Gerard speaks of this species under the name of “Golden Mother-woort, or Cud-weed;” and he describes the flowers as standing “on the top of the stalkes ioined together in tuftes of a yellow colour, glittering like golde, in forme resembling the scalie flowers of Tansie, which being gathered before they be ripe or

withered, remain beautiful long time after, as my selfe did see in the handes of Master Wade, one of the clerks of hir Maiestie's Counsell, which was sent him among other things from Padua, in Italie." This species seems to be improperly called Orientale, since it is stated to be a native plant of Africa. It has been long cultivated in Portugal, where it is principally used to ornament the churches in the winter season; but it is of too tender a nature to stand the severity of our winters without the protection of either a frame or a green-house. When planted in the open garden it should be placed in a warm sunny situation, and have a light soil. It is raised from seed, which should be sown in pots in the spring, and placed under a frame to forward them; and it may also be propagated by slips, or cuttings, taken off at a joint, during the summer months. These should be covered with a hand glass, and kept shaded from the sun, and moderately moist until they have taken root, when they may be gradually accustomed to the air, and kept as much as possible in a dry atmosphere. The time of flowering is from May to the end of August.

We have obtained nineteen species of *Gnaphalium* from the Cape of Good Hope, all of which require the protection of the conservatory during the winter months, and to be planted in peat or sandy loam: several of these exotic species are of sufficient beauty to repay this attention,

AMARANTH. *Amaranthus.*

Natural Order *Miscellanæ*, Lin. *Amaranthi*, Juss. A
Genus of the *Monoecia Pentandria* Class.

Sad Amaranthus, in whose purple gore
Meseems I see Amintas' wretched fate,
To whom sweet poets' verse hath given endlesse date.
SPENSER.

THE Amaranth flower is made the emblem of immortality ; and the bards have placed it in the list of funereal flowers, because the father of poetry has described the Thessalians as wearing crowns of Amaranths at the funeral of Achilles.

Milton mentions this flower as forming the diadem of angels, and the plant itself seems immortalized by the power of his majestic pen :

With solemn adoration down they cast
Their crowns inwove with Amaranth and gold ;
Immortal Amaranth, a flower which once
In Paradise, fast by the tree of life,
Began to bloom, but soon for man's offence
To heaven removed, where first it grew, there grows
And flowers aloft, shading the font of life,
And where the river of bliss through midst of heaven
Rolls o'er Elysian flowers her amber stream,
With these that never fade.

Malherbe, a French poet of the sixteenth century, in an ode to Henry the Fourth, says—

Ta louange, dans mes vers,
D'amaranthe couronnée,
N'aura sa fin terminée
Qu'en celle de l'univers.

In Sweden they have Knights of the Amaranth. This order was first instituted in the year 1653, by Christiana, Queen of Sweden, who, upon this occasion, appeared at a fête in a dress completely covered with diamonds, and attended by a suite of sixteen nobles of her court, accompanied by the same number of ladies. At the conclusion of the ball, the Queen stripped herself of the diamonds and distributed them to the company, at the same time presenting the new order of knighthood, consisting of a ribbon and a medal, with an Amaranth in enamel, surrounded with this motto :

Dolce nella memoria.

Love and friendship are also adorned with Amaranth. In the garland of Julie are these four lines :

Je suis la fleur d'amour qu'amarante on appelle,
Et qui vient de Julie adorer les beaux yeux.
Roses, retirez-vous, j'ai le nom d'immortelle,
Il n'appartient qu'à moi de couronner les dieux.

The name of this plant is derived from *Aμαράνθος*, incorruptible, because the flowers of several of the species do not wither when gathered ; and hence the

poets have frequently named it, and we sometimes find it, as in Milton, an imaginary flower, supposed, according to its name, never to fade. Pope mentions it in his Ode for St. Cecilia's day :

By the streams that ever flow,
By the fragrant winds that blow
O'er the Elysian flow'rs ;
By those happy souls that dwell
In yellow meads of Asphodel,
Or Amaranthine bow'rs.

M. Constant Dubos, in a charming idyl, has sung of this flower, the sight of which consoles us for the rigours of winter. After having regretted the rapid flight of flowers and the spring, he says :

Je t'aperçois, belle et noble amarante !
Tu viens m'offrir, pour charmer mes douleurs,
De ton velours la richesse éclatante ;
Ainsi la main de l'amitié constante,
Quand tout nous fuit, vient essuyer nos pleurs.
Ton doux aspect de ma lyre plaintive
A ranimé les accords languissans ;
Dernier tribut de Flore fugitive,
Elle nous légue, avec la fleur tardive,
Le souvenir de ses premiers présens.

Amongst the most familiar of this genus of plants is *Amaranthus Caudatus*, known by the melancholy name of Love-lies-bleeding, and which the French call *Discipline de Religieuse*, and *Queue de Renard*, Fox's Tail. This species, which is a native of the East Indies, was cultivated by Gerard, under the name of Branched Flower Gentle, as long

back as the time of Queen Elizabeth. He tells us the seed was given him by Lord Edward Zouche; and he describes the flower, saying, “ I can compare the shape thereof to nothing so fitly as to the velvet head of a stagge, compact of such soft matter as is the same, but of a deepe purple colour.”

The Three-coloured Amaranth, *Tricolor*, is also a native of the East Indies, which we can trace back in our gardens to the year 1596, under the name of Floramor and Passeuelours; and as this species has always been cultivated more on account of its three-coloured foliage than for its flowers, we cannot forbear extracting the description which Gerard gives of this plant, since he was the first who cultivated it in this country. “ It farre exeedeth my skil to describe the beautie and excellencie of this rare plant, called *Floramore*; and I thinke the pensill of the most curious painter will be at a staie when he shall come to set him downe in his liuely colours: but to colour it after my best manner, this I saie. In his leaues doth consist his beautie; for in fewe words, euery leafe doth resemble in colours the most faire and beautifull feather of a Parrat, especially those feathers that are mixed with most sundrie colours, as a stripe of red, and a line of yellow, a dashe of white, and a ribbe of greene colour, which I cannot with words set foorth, such is the sundrie mixtures of colours that

Nature hath bestowed in hir greatest iollitie vpon
this flower."

This plant, whose variegated leaves remind us of Joseph's coat, is extremely ornamental amongst evergreen shrubs, with which it forms a most agreeable contrast, particularly when planted in clumps of a sufficient size to give effect. This species grows naturally in Persia, China, and Japan, as well as at Ceylon, the Society Isles, &c.

Prince's Feather, *Amaranthus Hypochondriacus*, is a native of Virginia: it has been in this country since the year 1684, and has so far naturalized itself to our climate as to become a weed. This is also an ornamental plant amongst dwarf shrubs and in open spaces of the shrubbery.

We learn from Dr. Turner, that one species of Amaranth was cultivated in our gardens previous to 1564, which he calls *Amaranthus Purpureus*, and says it is called in English " Purple Velvet Floure, or Flour Amour."

The leaves of most of these species of Amaranth are used as culinary plants in hot countries, and the seeds of several of them were sent to this country for the same purpose; but as they are neither so hardy as spinach, nor so agreeable to the palate when cooked, they have long since given place to that esculent vegetable.

The greater number of the Amaranths being

annual plants of hot countries, require the assistance of the hotbed to forward the young plants. The seed should be sown in February, on a hotbed covered with good rich light earth, and when of a proper size to remove, they should be planted out into a second hotbed, and treated in the same manner as Balsams and other tender annual plants, until the time of removing them into the open garden.

GLOBE AMARANTH. *Gomphrena Globosa.*

Natural Order same as the foregoing, but of the Class *Pelandria*, and Order *Digynia*, of the Linnsean System.

Amaranths such as crown the maids
That wander through Zamara's shades.

MOORE.

THIS plant grows naturally in Sumatra, or Zamara, an island in the Indian Ocean, and the flowers are much worn by the inhabitants in their hair. These people when not engaged in war lead an indolent life, passing great part of their time in playing on a kind of flute, crowned with garlands of flowers, among which the Globe Amaranth is the greatest favourite, and the most prevailing flower. These flowers, which are of a fine shining purple, will re-

tain their beauty and freshness for several years if gathered before they are too far advanced; and on this account they are much cultivated in Portugal and other warm Catholic countries, for the purpose of adorning the churches in the winter. It is also one of the flowers that form the garlands and crosses which are sold at the gates of Père la Chaise, and is likewise deemed one of the principal ornaments of the dried bouquets of this country.

The French call this plant *Immortelle Violette*, and *Toide* and *Tolide*. It appears to have been cultivated in Holland about the year 1670, from whence it was obtained by the Duchess of Beaufort in 1714. The variety with white flowers was also procured from Holland, and cultivated by Mr. Miller in 1722. This annual plant is raised by sowing the seeds in a hotbed, as directed for the other kinds of Amaranth.

CRESTED AMARANTH, or COCK'S
COMB. *Celosia Cristata*.

A Genus of the *Pentandria Monogynia* Class.

The generic name of this singular plant is derived from the Greek *κηλεός*, brilliant, or *κηλέω*, to entice

or enchant. The English name of Cock's Comb, and the French *Crête de Coq*, is given on account of the resemblance which the crested head, or mass of flowers, has to the crest or comb of a cock.

The flowers of this plant are so numerous and small, and so closely set together on an irregular flattish surface, that it frequently looks more like a piece of rich velvet than a vegetable substance. We do not find it placed in floral language, and have therefore given it as the emblem of singularity. It is a native of several parts of Asia, and is common in Persia, China, and Japan, where we are informed it is cultivated to such perfection, that the crests or heads of the flowers are frequently a foot in length and breadth.

This species of Celosia appears to have been known in this country as long back as 1570; but from the imperfect manner of forcing plants at that early period of British gardening, we may conclude that the plants were frequently lost without affording seed. The most perfect plant of this kind that has been raised in England, and we presume we may say in Europe, was grown by Thomas Andrew Knight, Esq., and sent by him to the Horticultural Society of London in October, 1820, a drawing of which is now to be seen in the library of that institution. The flower of this extraordinary plant measured seven inches in height and eighteen inches

in width ; it was thick and full, and of a most intense purplish red colour.

In producing this singular plant, the first object was to retard the protrusion of the flower-stalk, so as to give it as much strength as possible. "The compost employed was of the most nutritive and stimulating kind, consisting of one part of unfermented horse-dung, fresh from the stable, and without litter, one part of burnt turf, one part of decayed leaves, and two parts of green turf, the latter being in lumps of about an inch in diameter, in order to keep the mass so hollow, that the water might have free liberty to escape, and the air to enter."

The seeds were sown in spring, rather late, and the plants put first into pots of four inches diameter, and then transplanted to others a foot in diameter, the object being not to compress the roots, as that has a tendency to accelerate the flowering of all vegetables. The plants were placed within a few inches of the glass, in a heat of from 70° to 100° ; they were watered with pigeon-dung water, and due attention paid to remove the side branches when very young, so as to produce one strong head or flower.—*Hort. Trans.* iv. 322.

There are varieties of the Cock's Comb with heads of an orange-yellow, bright-red, purple, and white;

and the form of the crests are so variable as seldom to give two of the same shape.

In the floral games at Toulouse, the prize for the finest lyric poem is an Amaranth of gold.

XERANTHEMUM, or IMMORTAL FLOWER. *Xeranthemum.*

Natural Order *Compositæ Discoideæ Corymbiferæ*, Juss.
A Genus of the *Syngenesia Polygamia Superflua* Class.

THIS plant derives its name from the Greek $\xi\eta\rho\sigma$, dry, and $\alpha\nu\theta\sigma$, a flower, because the petals of the corolla are of a dry chaffy nature, and the flower therefore does not wither when gathered, but is, on this account, admitted into the number of immortal flowers. It forms one of the principal ornaments of the dried bouquets, as the colours vary from white to a bright glossy yellow; whilst others are of a fine lilac or purple, resembling flowers formed of foil and floss silk.

In their natural state these flowers are single, but the art of the florist has doubled the petals from a single row to eight or ten rows of irregular-sized petals, falling over each other like the scales of fish. The seeds are feathered similar to those of the Dandelion, but are set on a flat, instead of a globular receptacle. When these flowers are intended to be kept in a dried state, they should be

gathered before the seed is matured; for it frequently happens that when the seeds have arrived at maturity they fly off when dry, and this sometimes happens in the most beautiful manner. The seeds, releasing themselves from the receptacle, are only kept together by the feathery nature of their plumage, which, as it becomes agitated by the air, escapes by swelling first into a kind of dome, the feathers being attached to each other in the most delicate manner imaginable, with the seeds downwards; after which, as they loosen themselves, the effect is still more delicate and singular, as it resembles, in miniature, a number of stars being thrown out of a circular piece of fire-work.

The annual Xeranthemum is a native of the South of Europe; and the first notice we have of its being cultivated in this country was in 1658, when it was growing in the botanic garden at Oxford, under the management of Jacob Robart, a German, who was the original gardener of that establishment. This plant sends up a stalk of about two feet in height, on which the purple or white flowers are supported. These, when gathered just before the seeds are ripe, retain their beauty for a great length of time, and the brilliancy of the purple colour may be restored at the end of several years, by holding them in the vapour of any acid.

This plant is best raised by sowing the seeds in

the autumn, soon after they are ripe, for, when omitted until the spring, the plants seldom grow to their natural size, or produce either fine flowers or seeds.

The seed should be sown on beds of free light earth, in a dry and warm situation. When the plants are about two inches high, they may be transplanted into other beds, or into the quarters of the parterre where they are intended to flower.

The Great Yellow-flowered Xeranthemum, *Fulgidum*, is a native of the Cape of Good Hope, and was introduced by Mr. Masson, in 1774.

MARVEL OF PERU. *Mirabilis.*

Natural Order *Nyctagineæ*, Juss. A Genus of the
Pentandria Monogynia Class.

Of colours, changing from the splendid Rose
 To the pale Violet's dejected hue.

AKENSIDE.

ON this marvellous plant of the New World, whose flowers seem too timid to expand their variously coloured corollas even to an European meridian sun, and on which account the French have named it Belle de Nuit, M. Constant Dubos has given us the following beautiful lines:—

Solitaire amante des nuits,
 Pourquoi ces timides alarmes,
 Quand ma muse au jour que tu fuis
 S'apprête à révéler tes charmes ?
 Si, par pudeur, aux indiscrets
 Tu caches ta fleur purpurine,
 En nous dérobant tes attractions,
 Permetts du moins qu'on les devine.

Lorsque l'aube vient éveiller
 Les brillantes filles de Flore,
 Seule tu sembles sommeiller
 Et craindre l'éclat de l'aurore.
 Quand l'ombre efface leur couleurs,
 Tu reprends alors ta parure ;
 Et de l'absence de tes fleurs
 Tu viens consoler la nature.

Sous le voile mysterieux
De la craintive modestie,
Tu veux échapper à nos yeux,
Et tu n'en es que plus jolie.
On cherche, ou aime à découvrir
Le doux trésor que tu récèles ;
Ah ! pour enoer les embellir,
Donne ton secret à nos belles.

In emblematical language this flower is made the symbol of timidity.

The generic name of *Mirabilis* was given to this plant from the wonderful diversity of colours in the flowers. This beautiful plant was originally brought into Spain from Peru, where it was called *Hachal*, and for some short time it retained the name of *Hachal Indi*. It was first named *Mirabilia Peruviana* by *Carolus Clusius*, and we may therefore naturally conclude that it was first introduced into Europe from the middle to the end of the sixteenth century, that being the period of his botanical labours. From the form of the flowers being somewhat similar to those of the Jasmine, several old writers named it *Jasminum Mexicanum*.

It was first cultivated in this country in the time of Gerard, who tells us, in his work of 1597, that he had then planted it many years in his garden, and that in temperate years he had procured ripe seed. He writes at considerable length on the beauty of the flowers, and says, it ought to be

called "rather the Marvel of the World than of Peru alone."

Jacobus Antonius Cortusus, a professor of botany at Padua, who died in the year 1593, first discovered the cathartic qualities of the root of this plant; and it was shortly afterwards supposed to be the true Gelapo, or Jalap of the shops, and the plant was accordingly named *Mirabilis Jalapa*. Dr. James observes, in his History of Drugs, 1745, that the Jalap "was a root unknown to the ancients, and also in Europe till the discovery of America." He adds, "It usually comes from the Spanish West Indies in transverse slices, about an inch thick, being rugged, and of a dark brown colour on the outside, and whitish within, full of black shining resin." This has been believed, by most authors, to be the root of a Convolvulus, Mr. Ray noticing it as *Convolvulus Americanus, Jalapium Dictus*; but, if we may rely on the account which Father Plumier gives of it, it is a species of *Mirabilis Peruviana*, or Marvel of Peru.

Boerhaave, Dale, and most other medical writers of that day, were of opinion that the Jalap root was the same as the Marvel of Peru; and the same idea prevailed in the French School of Medicine, as we find Tournefort, Pomet, Lemery, and others have, from the authority of Plumier, stated

the Jalap to be the root of the *Belle de Nuit*. This error has been since discovered, and it is now clearly ascertained that the true Jalap is the root of an American species of *Convolvulus*, distinguished by the title of *Jalapa*, consequently, the *Mirabilis* is now frequently called False Jalap. We are indebted to Dr. Houston for this discovery, he having ascertained the fact in the Spanish West Indies, from whence he brought over a drawing of the plant, made by a Spaniard at Xalapa or Halapa. Seeds of the *Convolvulus Jalapa* appear to have been introduced by Charles Du Bois, Esq., about the year 1728; and Mr. Miller informs us that he received three seeds of this plant from the Spanish West Indies in the year 1736, one of which he reared in the botanic garden at Chelsea, where it became a large plant, having a tuberous root as large as that of the Jalap commonly imported. This plant perished in the severe winter of 1739-40, without having flowered.

The Marvel of Peru has a fusiform root, which should be taken up in the autumn and kept under cover in dry sand until the spring, when it may be planted where it is to flower; but as the seeds which are sown in the spring produce plants that flower in the summer, this mode of preserving the roots is not usually attended to.

The seed should be sown in March on a mode-

rate hotbed. When the plants are come up they should have plenty of air admitted as often as the weather is mild, and when they are about two inches in height they may be transplanted into a second very moderate hotbed; or each plant be put into a small pot filled with light rich earth, and plunged into a hotbed, from whence they may be taken out into the borders with more security than those that are planted in the bed.

As soon as the plants have taken root in the second hotbed, they should be gradually inured to the open air, which will prepare them for the open garden about the beginning of June. The seeds may be sown in a warm open border in April, which will give plants for the autumn flowering.

From the size of these plants, being branched, and from three to five feet in height, they are better calculated for the foreground of the shrubbery than for the smaller borders of the parterre. They retain their beauty for a great length of time, being frequently covered with blossoms from the beginning of July to the end of October, and the flowers are so numerous that the plants have a most cheerful appearance, particularly towards the evening, as they seldom expand in warm weather before four o'clock in the afternoon, on which account it is sometimes called Four o'Clock

Flower." But when the sun is obscured, and the weather is moderately cool, these timid blossoms remain open during the whole day.

It is necessary to preserve seeds from different plants, since those of the white or purple varieties, however they may sport in these two colours, never produce plants that give out red or yellow flowers, and one great beauty in the effect of these plants is to give a mass of varying colours.

The Marvel of Peru is particularly well adapted for public gardens that are frequented in the evening, since these flowers appear awake and gay when most other blossoms sleep; and when the light of lamps is thrown on their numerous and richly dyed corollas their appearance becomes enchanting, and deserving of the title of *Belle de Nuit*.

These plants, when forced and cultivated in large pots, are well calculated to decorate the saloons of the gay; for however timid the flowers may appear in meeting the smiles of the God of Day, they stand the blaze of the strongest artificial light as cheerfully as other belles who delight to shine at the same hour with the emblem of timidity.

**FORGET-ME-NOT, OR MOUSE-EAR SCOR-
PION-GRASS. *Myosotis Palustris.***

Natural Order *Asperifoliæ. Boragineæ*, Juss. A
Genus of the *Pentandria Monogynia* Class.

Pour exprimer l'amour, ces fleurs semblent éclore ;
Leur langage est un mot—mais il est plein d'appas !
Dans la main des amans elles disent encore :
Aimez-moi, ne m'oubliez pas.

Lettres à Sophie.

THIS beautiful little flower, which enamels the banks of our rivers with its corollas of celestial blue, has become celebrated by a German tale, so full of melancholy romance as to affect all the Demons and Phillises of Europe that haunt the purling streams.

It is related that a young couple, who were on the eve of being united, whilst walking along the delightful banks of the Danube, saw one of these lovely flowers floating on the waves, which seemed ready to carry it away. The affianced bride admired the beauty of the flower, and regretted its fatal destiny, which induced the lover to precipitate himself into the water, where he had no sooner seized the flower than he sank into the flood, but making a last effort, he threw the flower upon the

shore, and at the moment of disappearing for ever, he exclaimed, "*Vergils mich nicht*," since which time this flower has been made emblematical of, and taken the name of "Forget-me-not."

It has become a favourite flower with the German poets, as some lines of Lord Francis Leveson Gower's translation of Goëthe's "Lay of the Imprisoned Knight" will evince:—

Ah ! well I know the loveliest flower,
The fairest of the fair,
Of all that deck my lady's bower,
Or bind her floating hair.

Not on the mountain's shelving side,
Nor in the cultivated ground,
Nor in the garden's painted pride,
The flower I seek is found.

Where time on sorrow's page of gloom
Has fix'd its envious lot,
Or swept the record from the tomb,
It says Forget-me-not.

And this is still the loveliest flower,
The fairest of the fair ;
Of all that deck my lady's bower,
Or bind her floating hair.

This flower has been figured as a device on the seals of lovers, and had its praises sung in their verses:—

To flourish in my favourite bower,
To blossom round my cot,
I cultivate the little flower
They call Forget-me-not.

It springs where Aven gently flows,
In wild simplicity,
And 'neath my cottage-window grows,
Sacred to love and thee.

This pretty little flow'ret's dye,
Of soft carolean blue,
Appears as if from Ellen's eye
It had received its hue.

Though oceans now betwixt us roar,
Though distant be our lot,
Ellen ! though we should meet no more,
Sweet maid, Forget me not !

The *Myosotis Palustris* is seen no where in greater perfection and abundance than on the banks of a stream in the environs of Luxembourg, which is known by the name of the Fairies' Bath, or the Cascade of the Enchanted Oak. The romantic banks of this stream are covered with these pretty blue flowers from the beginning of July until the end of August, and being reflected in the pure waters, appear more numerous than they really are.

To this favourite spot the young girls often descend from the ramparts of the town to spend the leisure hours of their Saints' days, in dancing on the borders of this stream, where they are seen crowned with the flowers which the waters afford them, like so many nymphs celebrating games in honour of the Naiad of the Enchanted Oak.

These scenes forcibly call to our recollection

some beautiful lines of an anonymous poet, who says,—

I see thee yet, fair France, thou favour'd land
Of art and nature—thou art still before me ;
Thy sons, to whom their labour is a sport,
So well thy grateful soil returns its tribute ;
Thy sun-burnt daughters, with their laughing eyes
And glossy raven locks. But, favour'd France,
Thou hast had many a tale of woe to tell,
In ancient times as now.

The stream which we have just alluded to is called the Cascade of the Enchanted Oak, from the circumstance of the spring's escaping with a murmuring noise from the root of an oak of great antiquity.

For some years past this little flower has been cultivated in France with the greatest care, and when sent to the Parisian markets it finds a more ready sale than any exotic plant. The pots being filled with young cuttings that readily take root and blossom, present such a mass of these delicate little flowers, as must surprise those who have not seen them thus treated.

The generic name of this plant is derived from that given it by the ancients, who called it *Myos* *arion*, Mouse-ear, from the form of the leaves ; and the French on the same account call it *Oreille de rat*, Rat's-ear. It frequently flowers in May, and continues to give out a succession of blossoms until the end of August. It is increased by separating the roots, and planting them in a moist but free

earth ; and when planted thickly on the banks or borders of streams or ornamental lakes, it is seen to peculiar advantage. When cultivated in pots, it should be shaded until the slips have taken fresh root ; after which the pots should be placed in an open and free air, giving them water when the weather is dry. When in blossom, they may be taken into the house, where these elegant little blue flowers, with their bright yellow eye, cannot fail to attract all the admirers of Nature's charms. This plant is sometimes seen growing naturally in dry grounds, but in such situations both the plant and the flowers are very diminutive in comparison to those growing in or near the water.

We earnestly recommend the cultivation of this rustic little beauty, and particularly so to those cottagers who live near towns, as by transplanting the trailing branches from their borders into small pots, they would find it a profitable employ to send them to market, for few people would withstand the temptation of purchasing these alluring flowers, that carry in their eye the tale of "Forget-me-not."

We have lately found the *Myosotis Versicolor* growing in considerable quantities on the graves in the church-yard of Hoove, near Brighthelmstone. This beautiful but miniature flower exhibits a rare instance of plants producing flowers on the same stem of such opposite colours as blue and yellow.

We observed several plants of this species of *Myosotis*, with some flowers perfectly yellow, some crimson, and others blue, all blossoming at one time on the same stem.

We are informed that the decoction, or the juice, of the *Myosotis Palustris* has the peculiar property of hardening steel, and that if edged tools of that metal be made red-hot, and then quenched in the juice or decoction, and this be repeated several times, that the steel will become so hard as to cut iron, or even stone, without turning the edge.

In the Netherlands, it is common to make a syrup of the juice of the *Myosotis*, which is given as a remedy against consumptive coughs.

SCARLET FUCHSIA. *Fuchsia Coccinea.*

Natural Order *Myrtoideæ*. A Genus of the Octandria.
Monogynia Class.

— From the blooming store
Of these auspicious fields, may I unblamed
Transplant some living blossoms, to adorn
My native clime.

AKENSIDE.

THIS beautiful exotic plant is a native of Chili, and although it has now become familiar to most parts of Europe, it was unknown to the old world until the year 1788, when it was presented by Captain Firth to the Royal Garden at Kew, from whence it was soon afterwards distributed as a stove plant. From the stove it was removed to the greenhouse, and it is now found to be sufficiently hardy to stand the open garden, if planted in warm situations, where it is sheltered from the north by a wall or buildings; and, like the China Roses, which were for some years treated as a tender plant, the Fuchsia is found to grow with greater luxuriance in the open air, than when nursed as a house plant.

Mr. Lee, of Hammersmith, was the first of our nurserymen who had this plant for sale, which,

from its great beauty, brought a high price for several years, until its easy propagation became generally known.

This plant was named *Fuchsia*, in honour of Leonard Fuch, a famous German botanist of the sixteenth century ; and we do not find that it bears any other name in Europe, nor have we been able to ascertain its original South American name.

We have placed the *Fuchsia*, in the language of flowers, as the emblem of taste ; for with its richly-coloured blossoms, there is a peculiar harmony and beauty in the unassuming appearance of the flowers, which hang with so much gracefulness from amongst the elegant-shaped foliage of this plant. The length of the stamens also adds greatly to the beauty of these pendent blossoms, having the appearance of so many gems suspended from a small roll of the richest violet-coloured ribbon, over which the beautiful carmine calyx hangs like a half-expanded parachute, allowing only a glimpse of the purple petals to be seen between the openings, the whole being headed by an emerald-coloured receptacle for the seed. The calyx-buds, before they are expanded, have the appearance of ripe barberries ; and the young branches and the leaves of the plant have the veins tinged with the same fine crimson colour, which contributes greatly to the beauty of the plant.

The Fuchsia grows from four to six feet in height, but when protected from the frost it frequently attains a much greater height. We have seen it in conservatories from ten to fifteen feet, having all the lower branches pruned off, and thus forming a tree of the most enchanting appearance, the least breath of air setting all the pendent flowers in a graceful motion, an effect which cannot be given to the plant when kept as a shrub, or trained to a wall. The Fuchsia loves a rich light earth. It is easily increased by cuttings planted under a bell-glass, in the same manner as myrtles are raised, observing to give air, so as to prevent damping off. Where a number of plants are required, it is more desirable to raise them from seed, which should be sown in pots of rich earth placed in a hotbed.

HYDRANGEA, or CHINESE GUELDER-
ROSE. *Hydrangea Hortensis.*

Natural Order *Succulentæ*. *Saxifrage*, Juss. A
Genus of the *Decandria Digynia* Class.

Witness the sprightly joy, when aught unknown
Strikes the quick sense, and wakes each active pow'r
To brisker measures.

AKENSIDE.

FEW flowers ever excited greater interest than the Hydrangea produced on its first introduction into Europe ; nor do we remember an instance of any tender plant having become common in so short a period. The extraordinary size of the cymes of the flowers which this plant produces, even when confined in a small pot of earth, was a novelty alone sufficient to recommend it to every collector of exotic flowers. When it first became known in Paris, it was so eagerly sought after, and bore so high a price, as to make the fortune of the florist who had procured the first plants from England.

In this country we have followed the Hydrangea from the stove to the green-house, and from the green-house to the balconies of the wealthy and the casements of the cottagers, with a rapidity that

seems almost incredible in a plant that produces only abortive flowers. It is now found to be sufficiently hardy to stand the open air during the winter, and consequently it is seen as an undershrub in every pleasure-ground, and is become as common in the cottager's court as it was familiar a few years back in the village windows.

The native place of this plant is not yet ascertained, but it is, in all probability, an accidental variety of a Chinese plant, since it is commonly cultivated in the gardens of China and Japan, from whence it was procured by the late Sir Joseph Banks, who presented it to the Royal Gardens at Kew, in the year 1790.

In the garden the *Hydrangea* is likely to retain a favourable attention, for when planted in the foreground of taller shrubs, its profusion of monstrous flowers, which continue in beauty for a great length of time, must ever make it a desirable ornament. We have sometimes seen it planted on lawns, and growing to an incredible size, producing a fine foliage, intermixed with cymes of flowers of extraordinary beauty.

The colour of these flowers is green when young, but turns to a beautiful rose-colour when in perfection, after which they again become green as they decay.

Soon after the introduction of the *Hydrangea*,

it was observed that some of the plants produced flowers of a fine blue colour, but the cause of this change could not be easily accounted for, since the cuttings had been taken from plants with rose-coloured flowers. Some supposed that it was caused by oxide of iron, whilst others concluded that it originated from salt or saltpetre being accidentally mixed in the earth. We remember seeing a fine plant of this description with beautiful blue flowers at a cottage situated on a dreary common in Hampshire, where no one could at that time have expected to have found a common-coloured Hydrangea. The owner of the plant refused ten guineas for this flower, as it was the only one that had then been seen in the country, and the circumstance of a poor cottager having refused so large a sum for a plant excited great curiosity, and brought all the neighbouring inhabitants to see it. The poor woman, although she did not like to part with the plant that had been reared by a child whom she had lost, gladly sold cuttings to all who required them, every one of which when they blossomed produced flowers of the original rose-colour.

We have since learnt that the poor woman's plant had been reared from a cutting of the common rose-coloured variety, and that the change was owing to its being planted in the soil of the heathy common

on which she resided, mixed with a portion of turf ashes, whilst those who obtained cuttings planted them in good garden soil.

During the last year we saw exhibited at the London Horticultural Society a very beautiful plant of the Hydrangea, covered with cymes of flowers of a fine blue colour. This plant was grown in a pot of earth taken from Wimbledon-common, without any other mixture, which proves that the change of colour is produced by the nature of the soil; and it is now pretty generally known that some sorts of peat earth, as well as the yellow loam of heathy grounds, will produce this effect.

Mr. William Hedges, who has paid great attention to the propagation of the Hydrangea, gives the following directions for the treatment of this plant :—"As a succession of young plants is necessary, I raise some each year, by taking, in the beginning or middle of July, young shoots with three or four joints, cutting them off close to the joint which is at the bottom of the shoot; these are placed in rich earth, in a warm border, and covered with a hand-glass; they are shaded during the middle of the day, and sprinkled with water from a fine rose watering pot, two or three times a week, in the evenings, so as to keep them moist; the glass being kept close over them at all times. They will also grow by layers made in July, in the same way as is

usual with Carnations. The cuttings will be well rooted by the end of August, at which time, or early in September, they must be put singly into small pots, and placed under a frame, which at first must be shut up close; if they can be assisted by a temperate dung-heat at this time it will be better for them. In the frame they must be shaded and watered as before. About the middle or end of October, they are to be taken into the green-house, or other shelter, where they can be protected from wet and frost; during the winter, they must be watered once a week or fortnight, as they require. In the latter end of May or early in June following, they must be turned out into a bed of rich mould, in the open ground, to remain there till September, when they must be taken up and potted, and kept protected from damp and cold, as in the preceding winter. Instead of turning them out, as stated, in the spring, they may be retained in pots; but they must be shifted twice during the summer. By either method fine strong plants will be formed, fit for forcing or turning out in the succeeding spring. If wanted for the borders, let them be put out when all danger of their sustaining injury by frost is over; they will stand the winter in the borders, and will also bear flowers, though not so well as when protected by a house. Those which

are to flower in pots, are taken as soon as their buds begin to swell in the spring ; all the old mould being removed from their roots, they are planted in fresh earth, in pots of about eight inches in diameter at top, and placed in front of the green-house or peach-house ; if the plants are not over large, pots of smaller dimensions should be used ; these will come into flower in June. Care must be taken to supply them plentifully with water whilst they are coming into bloom, and it is best to place water pans under the pots, to secure a continual supply of moisture. If it is desirable to have plants in flower early in the spring, they must be shifted into their new pots in January, and brought forward with forcing heat. The mould I generally give to my *Hydrangeas* is a compost of loam and bog-earth, or leaf-mould, with a little sand, well incorporated together ; in this they will produce red flowers ; if they are expected to blow blue, they must be planted in pure yellow loam."

This genus of plants was named *Hydrangea* by Gronovius, a Dutch writer, who derived the appellation from the Greek *ωδηρι*, water, and *αγγος*, a vessel, in allusion to the quantity of water that these plants require.

As the *Hydrangea* is a plant so lately made known in Europe, it has not appeared in the lan-

guage of flowers, and as it gives out such magnificent blossoms without ever producing fruit, we have made it emblematical of a boaster, whose vaunting words resemble the abortive flowers of the Hydrangea, large and showy, without being followed by suitable results.

PERSICARIA. *Polygonum Orientale.*

Natural Order *Holaraceæ*. *Polygonæ*, Juss. A Genus
of the *Oclandria Trigynia* Class.

— Their rise they boast.
From India's deserts or Columbia's coast.

EUROPE is indebted to M. Tournefort for this eastern plant, that celebrated botanist having first noticed it growing in the Prince of Teflis's garden in Georgia, and he afterwards procured the seed from the garden of the monks of the three churches near Mount Ararat, the spot on which the ark is supposed to have rested : we have therefore made it the emblem of restoration.

The Duchess of Beaufort appears to have been the earliest cultivator of the Oriental Persicaria in this country, it having been introduced by her Grace in the year 1707 ; and, although it is pronounced to be a native of the East Indies, it has so far become a denizen of our soil, that the plants which spring spontaneously from the self-sown seeds are generally finer than those raised by art ; from which we may learn that the autumn is the proper time of sowing this seed, and that it should

be but thinly covered with earth. The plants raised from seed sown in the spring seldom grow so strong, or produce so fine flowers.

When the plants, which are raised from the autumn sowing, are transplanted in the spring into a rich moist soil, they frequently grow to the height of eight or ten feet, displaying their clustering branches of brilliant carmine flower-buds to great advantage from July to the end of autumn. To assist the Persicaria in attaining this great height, all the lower branches should be regularly pruned off in the growing season, which gives strength to those of the upper part of the plant, and causes it to take a most elegant and graceful shape, the delicate lightness of which contrasts most agreeably with the stiff and heavy Sun-flower. The Persicaria, from its height and size, is only calculated for the largest parterre, or to intermix in the shrubbery.

Mr. Martyn enumerates thirty-six species of the *Polygonum*, ten of which appear in "British Botany" as native plants, one of which, *Fagopyrum*, however, it is doubtful whether it be even an European plant; but its cultivation under the name of Buck-wheat, is of great antiquity in England, as well as most European countries.

The generic name of these plants is derived from the Greek, Πολυγονον, from πολυ, many, and

yoww, knee, and it was so called in allusion to the numerous knots in the stalks. The British species of this genus of plants was formerly called Knot-grass on the same account. The name of Persicaria, by which several of the species are distinguished, is of modern origin, and was given to these plants on account of the foliage of the kind principally used in medicine being similar to that of the Peach-tree, which is called *Persica* in the Latin language. The leaves of the Oriental Persicaria are, however, quite of a different shape, being large, and of a broad oval shape inclined to a point, whilst the Persicaria Urena, *Polygonum Hydropiper*, has leaves of a narrow oblong shape like those of the Peach. Medical writers distinguish this species by the name of *Hydropiper*, water and pepper, from its hot, acrid taste, and because it grows in wet situations, and most abundantly in places that are under water in the winter. M. Tournefort tells us that the Eastern Persicaria was cultivated in Asia, principally on account of its medicinal properties, which are similar to those of the *Hydropiper* or Water-pepper, which was formerly held in high reputation in this country on account of its efficacy in medicine; but its pungency is so great as to be scarcely tolerable, for which reason alone, probably, it is but little used in modern practice. As an external application, in

form of a poultice, the biting taste can be of no objection; and it is stated, that the fresh leaves pounded and applied are of great efficacy in cleansing and altering the ill condition of long standing ulcers. It is also valuably applied in this manner to contusions and blows, for the purpose of speedily removing the blackness, by promoting the absorption of extravasated blood.

Country people chew the leaves as a cure for the tooth-ach, and they are said to have relieved the pains of the gout when applied to the parts affected.

Linnæus tells us, that all domestic quadrupeds reject this biting Persicaria. When gathered whilst in full blossom and preserved, it effectually keeps insects from wardrobes and other places; and on this account it is used by the Germans, to keep their chambers free from fleas.

SPEEDWELL. *Veronica.*

Natural Order *Personatae*. A Genus of the *Diandria Monogynia* Class.

No flower in field, that dainty odour throws,
And decks his branch with blossoms over all,
But there was planted, or grew natural.

SPENSER.

We have no less than seventeen species of the *Veronica* that are indigenous to our country, varying so much in their nature that some display their azure flowers only in the stream, whilst others exhibit their blue corollas on the chalky hills and sandy fields, some fix themselves in marshy ground, some seek the shade of woodlands, and one species attaches itself to old walls.

To this family of plants we have added forty-one exotic species, making, in the whole, fifty-eight, several of which are greatly celebrated by old medical writers, as being efficacious against so many disorders to which the human frame is subject, that the author of "*Hist. Plant. adscript. Boerhaave.*" says he has cured a hundred different disorders with the *Veronica Orientalis*; and Francus wrote an entire work on the virtues of this single

plant, which is said to have cured a King of France of the leprosy, saved the nose of a Welsh gentleman, and given children to a barren wife.

Milton very justly observes—

Dwell in herbs and drugs a pow'r
To avert man's destined hour,
Learn'd Machaon should have known
Doubtless to avert his own.

Hoffman says, the generic name of this family of plants was derived from $\phi\epsilon\rho\omega\eta\kappa\eta\gamma$, meaning $\phi\epsilon\rho\omega$, to bring, and $\nu\kappa\eta$, victory, because it was said to bear the bell among plants.

Without going into the extreme infatuation of our medical ancestors, it may perhaps be equally bad to neglect these celebrated plants in modern practice. We shall not, however, presume to give more than this hint, because it is generally acknowledged that medicine is now advanced to a greater degree of perfection than it ever reached in ancient times. We shall, however, recommend the Brooklime, *Veronica Beccabunga*, to be eaten as watercresses by those who have a tendency to scorbutic habits. It is even milder and more succulent than the water-cress, and only slightly bitterish in taste. It is generally found growing in rivulets with watercresses; the leaves are set on short petioles, blunt, slightly serrate, of a bright green, and somewhat fleshy. The flower-buds are of a reddish tint, but when they are expanded they are of a fine blue

colour, greatly resembling those of the *Myosotis Palustris*, or Forget-me-not. In Scotland, the sprigs of Brook-lime are brought to market under the name of *Water-purpie*.

The Spiked Speedwell, *Veronica Spicata*, whose bright blue flowers so agreeably enliven the barren spots where it principally flourishes, is one of the plants whose leaves afford a substitute for tea, and its taste is somewhat astringent, like the green tea of China. This plant becomes greatly improved by culture, sending up stalks of flowering spikes from twelve to eighteen inches in height.

The long-leaved Speedwell, *Longifolia*, is a native of Germany, Austria, and Russia; but it has been one of the plants of our parterres for several ages, having been cultivated in London previous to the year 1596. Of this species there are three varieties, one of which produces spikes of blue flowers, one with flesh-coloured, and one with white corollas.

The perennial sorts of Speedwell are increased by parting the roots in the autumn; and the seed of the annual kinds should be sown at the same season of the year, observing to place those with trailing branches on the slopes of banks in shady situations, whilst the tall-growing kinds may be intermixed with flowering shrubs.

The Speedwell is made the symbol of resemblance, in floral language.

PHLOX, *Phlox.*

Natural Order *Rotaceæ*. *Polemonia*, Juss. A Genus
of the *Pentandria Monogynia* Class.

— Come forth
In purple lights, till ev'ry hillock glows
As with the blushes of an evening sky.

AKENSIDE.

THESE brilliant flowers are all peculiar to the New World, excepting one species, which is indigenous to the northern part of Asia; and whether this one is the actual plant which the Greeks named Φλοξ, *Phlox*, *flame*, on account of its bright appearance, cannot be proved, since Theophrastus has not given a description to justify the assertion, and Pliny only observes that the Greeks used a flower in their garlands which they called *Phlox*. North America has yielded us no less than fifteen different species of these flaming plants, to which modern nomenclators have given the name of *Phlox*, and which we have presumed to place in symbolical language as the emblem of unanimity, in allusion to the united form of these flowers, whose clustered corymbs form an umbel, and from the country from whence we procured them.

Few plants present us with a more agreeable bouquet than is displayed on the stalks of some kinds of Phlox, some of which have their corollas of a beautiful lilac, lightly tinged with rose, some of an ardent red, some of a pure white, and others of a bright purple like a flame, from whence the idea of the name of *Flamma*, or Phlox.

The Smooth Phlox, *Glaberrima*, was the first kind cultivated in this country, which Miller seems to have grown in the botanic garden at Chelsea, as long back as the year 1725 ; and, although it is now a century since this plant was first introduced, yet it remains rather a rare than a common plant, in comparison to many others of less beauty, and later introduction. This kind sends up a stalk near twenty inches in height, dividing into three or four small branches towards the top, each terminated by a corymb of flowers, that usually appear in June.

The Shining-leaved Phlox, *Suffruticosa*, which was brought to this country in the year 1813, is a beautiful species, throwing up stalks about two feet in height, from which are displayed corymbs of flowers of a most brilliant violet purple colour, somewhat resembling a fine cluster of Polyanthus, excepting that the eye of the flower seems placed in a star. This ornamental plant, which is a native of South Carolina, flowers from the end of July to

the end of October. At present it is rather rare, and is therefore generally planted in pots, for the sake of bringing it into a house, or placing it under a frame during the winter, although it is sufficiently hardy to stand the open garden, if placed in a warm sheltered situation.

The Panicle Phlox, *Paniculata*, is a very fine species, growing to the height of from three to four feet, and embellishing its stalks with numerous flowers of a delicate lilac from the beginning of August to the end of September. This North American plant was first introduced to our gardens by James Sherard, M. D., who first cultivated it in the year 1732.

The White-flowered, or Odorous Phlox, *Sauvolens*, was first introduced to this country by Peter Collinson, Esq. This species is admired for its delicate white corollas, and its agreeable perfume. This is also a native of North America : it flowers in July and August.

We recommend these plants to a more general notice than florists have yet bestowed on them. Their cultivation is very simple, they being usually propagated by cuttings, or by parting the roots either in the spring or the autumn : but it should be observed not to part their roots into too small heads ; nor should they be parted oftener than

every second or third year, as it weakens the plant, and prevents its producing fine blossoms.

All these plants thrive best in a rich and moist loamy soil; for, when planted in a poor dry soil, their flowers are never large, and the plants frequently perish in the summer for want of moisture.

PIMPERNEL. *Anagallis.*

Natural Order *Rötaœæ*. *Primulacées*, Juss. A Genus
of the *Pentandria Monogynia* Class.

The hollow winds begin to blow,
The clouds look black, the glass is low;

Closed is the pink-ey'd Pimpernell,
"Twill surely rain; I see, with sorrow,
Our jaunt must be put off to-morrow.

DR. JENNER.

This beautiful little plant, whose sensitive flowers form the peasant's barometer, is frequently called the Shepherd's Weather-glass, because the corollas never expand in rainy weather, or when the air is moist; but, on the contrary, when the atmosphere is dry and the sun shining, they display their scarlet and purple with happy effect, bespangling the earth with their bright eyes in the most agreeable manner, but which are regularly and firmly closed when Phœbus retires to the west. This is one of the wonderful instincts of inanimate nature: were it otherwise, the damps of the night air would prevent the discharge of the farina from the anthers, and this species of plants would be conse-

quently lost to the link of Nature's perfect chain ; for although the Pimpernel is too lowly to excite the great interest of man, its seed is the food of insects, who have their office to perform towards the completion of the general harmony of the globe. The smaller kind of birds seek this seed with great avidity, and as it is a plant which follows cultivation, it may considerably save much of the seed of the husbandman from the ravages of the feathered tribe.

Like the Poppy, the Pimpernel is generally found in ploughed grounds and in gardens, particularly where the air is pure, and the soil light or sandy.

The Common Pimpernel, *Anagallis Arvensis*; continues to give out a succession of blossoms from the month of June to the end of September, and is, although a native weed, deserving of a situation on the parterre, its flowers being of a fine yellow scarlet, having a purple circle at the eye, which adds considerably to the beauty of this miniature flower.

The Blue-flowered Pimpernel, *Anaga llis Cærulea*, is far less common in this country than the Scarlet. It grows abundantly in Switzerland, Germany, and Sweden, and has been found in this country in the neighbourhood of Mitcham, in Surrey, near Histon, in Cambridgeshire, and Breton-hill, in Worcestershire. It is more frequent

in Devonshire than in any other part of England; but we have occasionally found it growing on the corn lands of the South Downs near Brighton, in Sussex.

The petals of the Blue-flowered Pimpernel have a spot of carmine colour at the base of each, in the same manner as the scarlet kind is marked by purple. Old writers, after the ancient authors, distinguish these two kinds of *Anagallis*, by calling the blue-flowered the female, and the red the male Imperial.

Pliny remarks that sheep avoid the Blue Pimpernel, but eat the scarlet kind, which he considers as extraordinary, since the difference of the plants can only be perceived by the colour of the flowers. He adds, that when a sheep has by accident eaten of the Blue Pimpernel, the animal goes by instinct to a plant, which he calls *Ferus oculus*. Schreber says, that the sheep eat Pimpernel readily; by the experiments in *Aman. acad.*, it appears, that kine and goats feed on it, but that sheep refuse it. If Pliny is correct in his observation, both these opposite statements may be also accurate, since neither of them mention whether the experiments were made with the blue or the scarlet kinds.

Etymologists differ materially respecting the derivation of the name of this plant. Dr. Martyn says the generic name is from *Αναγαλλις*, of Dioscorides, from *αναγελω*, to laugh; because by cur-

ing the spleen, it disposes persons to be cheerful. Coles thinks the name of *Anagallis* was given it from its growing abundantly by the river Gallus; but the most rational idea seems that it was derived from *anayw, anago*, to extract or draw out, since we find that the branches and leaves of the plant being pounded were used by the ancients, not only to draw forth thorns and splinters, but it was also considered of sufficient efficacy to extract the points of arrows and spears that were broken in the flesh.

The French call this plant *Mouron*, and the English name of Pimpernel, by which the earliest of our herbarists distinguish the plant, seems derived from *Primprenelle*, the French name for Burnet.

In floral language this little flower is made the symbol of assignation.

The Pimpernel is propagated by the curious in British plants, by sowing the seeds soon after they are ripe on a border of light earth. The Blue-flowered Pimpernel, being more uncommon in the field, is naturally the more desired in the garden; and as it is a delicate pretty flower, that we love to see in the small parterre, or on the banks or borders of the larger pleasure garden, we shall observe that it may be increased by cuttings; and when planted in a pot of light earth, and placed in a hot-bed, it will produce flowers in about six weeks.

This little plant, whose numerous branches spread themselves on the ground, being too weak to erect their flower-stems, but which catch our attention by the vivid scarlet of the corolla, was formerly in so great repute with medical practitioners, that, although it is now neglected in our practice, we shall notice the various uses that it was most celebrated for; and should it be found to possess but one of the qualities attributed to it by many eminent men, we shall regret that it ever was banished from modern medicine.

The Greeks and Romans, according to Pliny, used the juice of this plant, mixed with honey, for complaints of the eyes. Ettmuller, and many other writers of equal note, extol it as a remedy for madness. Quercetanus, who was celebrated for the cure of this disease, gave decoctions of Pimpernel after antimonial vomits and laxative medicine. In malignant fevers, with low muttering delirium, or wherever the functions of the brain are disturbed, the Pimpernel is said to be an efficacious medicine.

Tragus pronounced it a remedy for the plague; others recommend it in all convulsive disorders, hysteria, hypochondriasis, St. Vitus's dance, &c. In the early stage of consumption, the decoction of Pimpernel is said to be a most invaluable remedy. Externally, the juice or decoction, is employed for cleansing foul ulcers; and Geoffroy commends it

against the bite of the viper, or a mad dog, in which cases he says they should be copiously drunk at the same time. Simon Paulli mentions a cataplasm of Pimpernel, as a remedy for the gout.

Most writers agree in the opinion that this plant is very deterotive, and having a heating and drawing quality, is good to draw out thorns and splinters from the flesh ; and, upon the whole, has the virtue of drying without mordacity.

THORN-APPLE. *Datura Stramoninm.*

Natural Order *Luridae. Solaneæ*, Juss. A Genus of the *Pentandria Monogynia* Class.

Their powers mysterious let thy knowledge shift,
Their useful poison, and their healing gift.

DE LILLE.

IN symbolical language the Datura is made the emblem of deceitful charms, and the common Stramonium is given to represent disguisement.

This dangerous narcotic plant clothes itself with such an elegant indented foliage, and garnishes its branches with corollas of so graceful and negligent a shape, and of so pure a white, that all suspicion of its deleterious nature seems lulled to rest, whilst, like the Lamiæ of old, its charms only allure that its powers may destroy. Children are no longer in danger of being devoured by Lamiæ; but they are not free from danger where the Stramonium flourishes, as we have known several instances of its baneful effects to young persons who have endeavoured to chew this plant. It is only within a few years that a child, who amused itself with this poisonous plant in a garden at Worthing, was so affected as to have been in the greatest danger,

from which it was only relieved by the prompt assistance of a skilful medical practitioner. And it is not long since, that some of the thorn-apples being thrown from a garden into a street in the city of Chester, a child, who ate of the seeds, became blind and mad, biting, scratching, shrieking, laughing, and crying, in a frightful manner.

We feel it more necessary to caution the unwary against the dangers of this powerful plant, since it has had its medical virtues so much extolled as to induce the ignorant into a belief that it must naturally be an innocent and harmless vegetable ; but it should be impressed on the minds of persons in general that those plants which afford the most efficacious medicine in the hands of the skilful practitioner, are the most dangerous in those of the ignorant, and should therefore never be used as a domestic remedy.

The Stramonium is employed occasionally as an anodyne, on account of its narcotic properties not inducing constipation like opium. Its effects, however, are frequently formidable, and even fatal, when administered by the incautious.

Swaine mentions a case wherein a decoction of three of the capsules of the Stramonium in milk, produced a paralysis of the whole body, so that the patient became mad. He continued seven hours in this situation, then came to himself, and slept

quietly the remainder of the night. Mr. J. A. Waller observes "that a temporary madness seems uniformly the result of this poison." Vicat records a case of a man who drank a decoction of the fruit, and became melancholy, lost his voice, his pulse disappeared, and the limbs became paralyzed ; after which madness came on. Another, after drinking milk boiled with the same fruit, experienced vertigoes, became insensible, talked in a raving manner, had at first a small weak pulse, which afterwards became hardly perceptible. His legs were paralyzed, and he ultimately became mad. The smell alone of this plant causes ebriety, and it has been used for the most dreadful purposes in eastern countries. Garcias tells us that thieves mix it in the food of those whom they intend to rob ; and Acosta mentions that abandoned females frequently give it to their incautious gallants. In Java these unfortunate women take it themselves as a stimulus. Some of these women are so experienced in administering this medicine, and know how to temper it in such a manner, that its effects shall last for a certain time, or for as many hours as they please.

Indian princes have been known to make use of it to render their rivals stupid, and then to expose them to the people, to show how incapable they are to govern.

Waller observes, in his Domestic Herbal, that the fumes of this plant, received like those of tobacco, have, in no instance that he had heard of, been productive of any ill effects ; whilst at the same time, he says he has often witnessed the most beneficial results from its use in this manner, in asthmas, and old inveterate coughs. Some persons smoke the Stramonium alone, others mix it with tobacco ; " the best method, however, in my estimation," says Mr. Waller, " is a mixture of one third part of the stalks, fruit, leaves, and seeds of the Stramonium, properly dried, cut, and bruised, mixed with two thirds of herb tobacco."

An ointment, prepared from the leaves of the Stramonium, gives ease in external inflammations and haemorrhoids.

This plant is unquestionably a native of America ; Kalm says that in many parts of that extensive country it is one of the most troublesome weeds that grow about the villages, where the land is cultivated ; and it has been frequently observed that in the earth brought with plants from various parts of the new world, the Thorn-apple often springs up. The earliest English writers on plants who have mentioned the *Datura*, call it Thorny-apple of Peru. It appears to have travelled through the East Indies and Persia to Europe, as we find the seed was first brought to this country from

Constantinople, by Lord Edward Zouch, who gave it to Gerard, in the reign of Queen Elizabeth. Gerard observes that he made great use of the plant in his profession as a surgeon, not only for burns and scalds, but also for "virulent and maligne vicer, apostemes, and such like." This author tells us that he dispersed the seeds of this plant through this land. Thus we have a positive proof of the time of its introduction, and that it is not a native plant of this island, as it is frequently set down in many catalogues of British plants. It has, however, so far naturalized itself in our soil that it is frequently found in waste places and on dung heaps, and is often found a troublesome intruder on the parterre, for the seeds being dug into the earth, will remain for several years, and vegetate when again turned up to the air. When sown on a rich soil, the plants grow to a great size, which renders them unsuitable for the flower borders, but amongst flowering shrubs it has a good effect, both by its large foliage and its long tubular flowers, which appear from July to September. In the natural history of the Stramonium, this singular provision of nature is observed, that at night the leaves nearest the flowers rise up and enclose them, so as to form a shelter from the humidity of the air.

The generic name of *Datura*, by which this

plant is known throughout Europe, is the original name by which it was received from the Turks. It is called Thorn-apple from the nature of its fruit.

Nicolaus Monardes, a Spanish physician, tells us in his work published in 1564, that he received the first seeds of this plant from Peru, under the Indian name of *Cachos*, and that it came strongly recommended to him as a medicinal plant, which the Indians, as well as the Spaniards, in Peru, held in high estimation.

The Purple Thorn-apple, *Datura Fastuosa*, of which there is a variety with double flowers, is much more desirable for the garden than the common Stramonium. The flowers of this species are of a fine purple on their outside, and of a glossy white within. These have an agreeable odour for the moment, but if long snelt to it becomes less pleasing. This species is a native of the East Indies and Egypt, and was first cultivated in this country by Mr. Miller, in the year 1731.

MALLOW. *Malva.*

Natural Order *Columniferæ*. *Malvaceæ*, Juss. A
Genus of the *Monadelphia Polyandria* Class.

Who cut up Mallows by the bushes, and Juniper roots for their meat.

Job, xxx. 4.

FROM the above ejaculation of Job, we learn that the mallow afforded food in early times to those wandering tribes that have ever preferred to pitch their tent in the wilderness, and depend upon the spontaneous productions of the earth for their subsistence, rather than to dwell in settled habitations, where they would be expected to assist in the labour of multiplying the gifts of nature.

The name of this plant is thought to be derived from the Hebrew, in which language it is called *Malluach*, from its saltiness, *Malach* being the Hebrew word for salt. Gerard says, “I am persuaded that the Latin word *Malva* comes from the Chaldee name *Malluach*, the *ch* being left out for the good sound’s sake.” Some are of opinion that the Greeks called it *Μαλαχη*, and the Latins

Malva, from its softening and laxative properties ; and that this plant was used in the food of the Romans on account of this quality, appears by a line from Horace,

Shards or Mallows for the pot,
That keep the loosened body sound.

DAYDEN.

Martial also makes a similar remark :

*Exoneraturas ventrem mihi villica Malvas
Astulit, et varias, quas habet hortus, oper.*

Lib. 10.

The Greeks, as well as the Romans, ate this plant both boiled, and raw in salads, with lettuce and other vegetables.

The Chinese and the Egyptians still use a species of the Mallow in their diet.

The Mallow formed one of the funeral flowers of the ancients, it being customary to plant it around the graves and tombs of departed friends.

In floral language, the Mallow is made the emblem of a sweet or mild disposition.

Pliny speaks of two kinds of Mallows that were cultivated in the gardens of the Romans, which, he says, were distinguished from the wild Mallows by the size of the leaves. This author tells us that the leaves of the Marsh Mallow were used as a counter poison against the sting or bite of all venomous reptiles, from the wasp to the serpent ; and that the juice of Mallows given

warm, was a celebrated medicine for such as were gone melancholy, or were deranged in mind. We learn also from this natural historian, that Mallows were sown in the fields for the purpose of enriching the ground.

The common Mallow, *Malva Sylvestris*, is a plant which we see bordering the road sides in most parts of Europe; and although it so frequently meets the eye, from its flowers succeeding each other from the month of May to the end of October, yet its blossoms never tire the sight, their petals being of delicate reddish-purple, sometimes varying to a white, or inclining to a bluish cast, with three or four darker streaks running from the base. It is fortunate for the husbandmen that nature should allot this plant for the banks and borders of fields, rather than to scatter it over the meadows, since its spreading branches would, in a great measure, destroy the turf; and cattle in general refuse to eat this plant, so that it would soon overrun and smother other vegetation.

The Dwarf Mallow, *Malva Rotundifolia*, and the Musk Mallow, *Malva Moschata*, are also indigenous species of the Mallow.

Amongst the exotic Mallows, we shall notice the Curl-leaved, *Malva Crispa*, which was originally brought out of Syria, but most probably came to us through France, since Gerard calls it

the French Mallow, and he adds, “it is an excellent pot herbe, for which cause it is sown in gardens;” and to recommend it still further to us, this old medical writer commends its properties in verse :

If that of health you haue any speciall care,
Vse French Mallowes, that to the body holosome are.

Notwithstanding the strong recommendation of Gerard, this hardy annual plant is entirely banished from the kitchen-garden, but it is frequently to be seen amongst flowering shrubs, where its curiously curled and plaited leaves have a good effect, both by their singularity and agreeable pale green colour. The Hortus Kewensis notices thirty-four other exotic species of Mallow, that have been brought from various parts of the world to this country, where we have now more than sixty species, some of which are only humble herbs, whilst others are tall shrubs ; and some of the tribe reach the size of large trees, the trunks measuring from twenty to thirty feet in diameter. Several beautiful species of the Mallow have lately been brought from the Cape of Good Hope, but these at present are confined to the green-house.

The medical properties of the Mallow being considered the same as the *Althaea*, or Marsh-Mallow, will be noticed under the head of that article.

BUGLOSS. *Anchusa.*

Natural Order *Asperifoliae*. *Borraginæ*, Juss. A Genus of the *Pentandria Monogynia* Class.

THE Bugloss has been made the emblem of falsehood, because its roots are used in making rouge for the face. And why not? says the faded fair one.

——— Les ruines d'une maison
Se peuvent réparer ; que n'est cet avantage
Pour les ruines du visage ?

LA FONTAINE.

The good taste displayed by the British ladies of the present day in throwing aside the barbarous practice of disfiguring the *contour* of the countenance by a composition mask, or an unnatural stain, must be acknowledged by every one whose memory is a quarter of a century old.

Nothing more decidedly indicates an approach to the most refined state of civilization in any country or people than that of throwing off the disguise of art, and following the beauties of nature, whose works none can correct or make more perfect. For notwithstanding that the painting of the face has been sanctioned by all the courts of Europe, its origin was derived from the most un-

civilized part of mankind. In some mode or other this art has been employed in all quarters of the globe, and as each nation considers the customs of those who differ from themselves in the manner of disguising their persons as ridiculous, it proves the absurdity of the practice.

Madame de Latour observes, that from north to south, from the east to the west, amongst savage people, and in civilized nations, the taste for painting is universal. The wandering Arab, the sedentary Turk, the beautiful Persian, the small-footed Chinese, the blooming Russian, the phlegmatic English, the indolent Creole, and the lively trifling French women, all wish to please, and all like to do so by painting themselves. In the deserts of America the savages paint their bodies red with the root of a species of Bugloss, that is indigenous to their country. The ancient Britons painted their bodies of a blue colour. Duperron tells us that a young savage girl, who wished to attract his attention, took slyly a piece of coal, and, retiring to a corner, pounded it, and blacked her cheeks with the powder, then returned with a triumphant air, as if this ornament had rendered the effects of her charms more secure.

Galen notices the use of the Bugloss root as a cosmetic in his time, and the rouge made from the roots of this plant is said to be the most ancient as well as the most innocent of all the paints that are

prepared for the face; and it is also said to possess considerable advantages over other kinds of rouge, as it lasts some days without rubbing off, and water renews it in a similar manner as it refreshes the natural colour. We are further assured that it does not wither the skin so much as other kinds of rouge; but we would add, that all kinds of paint for the face are dangerous, for, however delicately it may be used in the first instance, it is sure to increase, although imperceptibly to the wearer, until it becomes a perfect mask. We have remembered several ladies, who, from having been accustomed to the use of rouge from an early age, increased the colour from year to year, until their cheeks were but a few degrees behind those of Grimaldi in a Christmas pantomime. Some years back we wished to pay our respects to a lady of rank on the day of her arrival at a sea-side hotel, where, on inquiring for Lady Sarah C——, we were asked if it was the lady with a striped face. The question would have been an enigma, had not a door opened at that moment, which presented Lady Sarah with her cheeks as regularly striped as the flanks of a zebra hide, which had originated from her ladyship's having rode the last stage in an open carriage, with the rain beating in her face. This story will not appear exaggerated, when we relate, that habit has induced some people to take lavender-water as a

substitute for spirits, and others to use coloured tooth-powder for want of rouge. But these misfortunes are nearly at an end, and the youthful fair begin to know that

Rien n'est beau que le vrai, le vrai seul est aimable.

The generic name of this plant is derived from Ἀγχούσα, *wapē τὸ ἀγχεῖν*, from its supposed constringent quality, or because it was said to strangle serpents. Dioscorides states, that both the roots and the leaves are good against the bite of venomous beasts, and especially of vipers, for which purpose it was eaten, or the infusion drank.

The Latin word of Bugloss is also derived from the Greek, and was given to this plant to express the extreme roughness of its leaves. The Dyer's Bugloss, *Anchusa Tinctoria*, is indigenous to Italy, Spain, and the South of France; it is cultivated in the latter place to some extent for the sake of the roots, which impart a fine deep red to oils, wax, and all unctuous substances, as well as to spirits of wine. The spirituous tincture, on being inspissated, changes to a dark brown. Its chief use is for colouring plasters, lip-salves, &c. This species was cultivated in England previous to the year 1596.

Anchusa and Cinnabar were used by the ancients to give an agreeable colour to their ointments; and Pliny tells us that, where the Anchusa was used, they added salt to prevent the oil in those compo-

sitions from growing rancid. This root was also in request by the Romans for colouring wood and wax, as well as to stain wool that was to be afterwards dyed, of their expensive purple, and for this purpose they were taken up about the time of wheat harvest, when the roots were full of a red juice. This author adds, that if a person who has chewed this plant, should spit in the mouth of a venomous creature, he will kill it.

Our apothecaries are principally supplied with these roots from Languedoc and Provence. It was formerly used as an astringent, and is proper in haemorrhages of all kinds.

These plants flower from the end of May to the end of September, but they have no great beauty to recommend them to a situation in the parterre. They prosper best in a sandy soil, and in a warm situation. We possess ten different species of Bugloss, most of which have a reddish, or blue corolla. The Virginian Bugloss, *Anchusa Virginica*, is the most ornamental species for the garden; it blossoms with yellow flowers, and the root has been used by the native Americans to stain their flesh from time immemorial.

SCABIOUS. *Scabiosa.*

Natural Order *Aggregalæ Diploaceæ*. A Genus of the *Tetrandria Monogynia* Class.

THIS plant derives its name from *Scabies*, because the common sort is said to cure this and other cutaneous complaints ; and on this account it is fabled that the devil having found the plant in Paradise, and envying the good this herb might do to the human race, bit away a part of the root in order to destroy the plant, but which still continues to flourish with a stumped root, and hence one of the species is called Devil's Bit.

The Indian, or Sweet Scabious, *Scabius Atropurpurea*, is called by the Italians *Fior della Vedova*, and by the French *Fleur de Veuve*, both of which means the Widow's Flower, and from hence it is made to express, in floral language, " I have lost all."

We learn from Parkinson, that this species of Scabious was common in our gardens previous to 1629 ; and this author mentions his doubts about its Indian origin, as he tells us, that it was then growing spontaneously in Spain and Italy : and

we find Mr. Aiton has left its native country undecided in the *Hortus Kewensis*; but Messrs. Pirolle and Noisette state it to be indigenous to India, in the late editions of *Le Bon Jardinier*, and Clusius relates that he received the seeds of this plant from Italy, in the year 1590, under the name of Indian Scabious.

The Sweet Scabious is a biennial plant, which grows about two feet in height, and in favourable seasons continues to flower from June to October, presenting us with corollas of so dark a purple, that they nearly match the sable hue of the widow's weeds : these being contrasted with anthers of pure white, gives the idea of its being an appropriate bouquet for those who mourn for their deceased husbands ; and this, we presume, gave rise to the Italian and French name of Widow's Flower. But this plant frequently varies in the colour of its flowers, sometimes producing blossoms of a pale purple at others red, or pleasingly variegated. It also occasionally becomes a proliferous flower, sending out small flowers from the calyx in the same manner as the Proliferous or Hen and Chicken Daisy. The scent of the Sweet Scabious is similar to that of musk, but not powerful enough to be offensive to the most delicate person.

These plants love a light fresh earth, and flourish best in warm situations. Miller directs the seed to

be sown at the end of May or beginning of June upon a shady border of fresh earth ; for he observes, that if they are too much exposed to the sun, and the season should prove dry, few of them will grow. And if they are sown early in the spring they will flower in the autumn, and the winter coming on will prevent the seeds from ripening, besides which the flowers will be few and weak ; whereas, if they are left to form a strong root and leaves in the autumn, they will send up their flower-stems early in the next summer, branching out on every side, producing a great number of flowers, continuing in succession from June to September, and yielding good seeds in plenty.

“ When the plants sown in May come up, transplant them into a bed or border of fresh earth, watering and shading them till they have taken root ; and, having kept them clean from weeds, transplant them at Michaelmas into the middle of the borders in the pleasure-garden.” These plants are seldom injured by cold, unless they send up flower-stems before winter.

The French florists recommend the seeds to be sown in the autumn, to prevent the plants from an inclination to flower the year they are sown.

Mr. Aiton notices thirty-three species of Scabious that have been cultivated in the royal gardens at Kew, and Martyn enumerates no less than forty-

three species in his excellent edition of Miller. Three of these varieties are indigenous to our fields, one of which, *Scabiosa Arvensis*, chooses to mix its lilac flowers amongst the corn, but in this situation its beauty cannot defend it from the umbrageous name of a weed, whilst the *Columbaria* and *Succisa* plant themselves in pasture-grounds, where their foliage becomes food for cattle.

All these native species were formerly held in estimation on account of their medical properties; and we find some of the most learned and respectable of the Æsculapian writers have highly extolled the virtues of these plants for all diseases of the lungs, and strongly recommend it as a soporific that may be usefully employed in fevers. Ettmuller commends its use, especially in all catarrhal fevers. He very highly extols a decoction of this plant in cutaneous eruptions and tinea, or scald-head, &c.

THROAT-WORT. *Trachelium.*

Natural Order *Campanaceæ*. *Campanulaceæ*, Juss.
A Genus of the *Pentandria Monogynia* Class.

THAT a plant of such a graceful elegance as the *Trachelium Cæruleum*, whose aërial umbles are so beautifully loaded with its pretty tubular flowers, that seem dyed with the finest tint of its native Italian sky, should not have had its praises sung either by the classic poets of old or nature's bards of later days, has induced us to make it the emblem of neglected beauty.

Nature permits her various gifts to fall
On various climes, nor smiles alike on all ;
The Latian vales eternal verdure wear,
And flow'rs spontaneous crown the smiling year.

FENTON.

In vain we have turned over the leaves of the Latin authors, with the hope of finding that this Italian plant had been made sacred to some fair goddess, or that it had formerly beautified the brow of the Graces themselves. Æsculapius seems also to have so completely overlooked this plant as to have left us no account of its virtues; and the flower we presume was found too beautiful for the ugly

hand of superstition to touch: so that we can neither embellish our history of this plant by the remarks of the poets nor the wonders of the credulous. We shall therefore make a present of this neglected plant to the artist who may be disposed to paint a bower for Ariel; for had it been known in this country in the time of our great dramatic bard, we feel satisfied that his fine imagination would have seated this aërial being on a bank beneath the umbelliferous branches of these azure flowers.

The Blue Throat-wort has been so much neglected by the British florists that it is rarely to be found on the English parterre, although we learn from Parkinson that it was introduced to this country previous to the year 1640, and it is a perennial plant sufficiently hardy to endure our winters, particularly when planted in a dry soil. It grows naturally in stony situations in Italy, and in some shady places in the Levant. Monsieur Desfontaines found it in Barbary, where it grew in the rocky fissures of Mount Atlas.

Miller observed, as long back as 1752, that "these plants thrive better on old walls, when by accident they have arisen from seeds; so their seeds, when ripe, may be scattered on such walls as are old, or where there is earth lodged sufficient to receive the seeds; where the plants will come up and resist the cold much better, and continue longer

than when sown in the full ground; and when a few of the plants are established on the walls, they will shed their seeds, so that they will maintain themselves without any further care. I have observed some plants of this kind, which have grown from the joints of a wall, where there has not been the least earth to support them, which have resisted the cold, though they have been greatly exposed to the winds, when most of those in the full ground were killed; so that these plants are very proper to cover the walls of ruins, where they will have a very good effect."

From this remark we were induced to scatter the seeds of the Blue Neck-wort with those of the Wall-flower on a broken wall, and on the second year we had as happy a combination of flowers as could be conceived from a mixture of blue and gold. But we must observe that those plants which sprung up just beneath the wall produced much larger cymes of flowers than such as grew out of the crevices of the stones; therefore we recommend some of these plants to be set in a good moist soil, so that if they should decay after flowering, their beauty would be seen to greater advantage during the summer, and other plants might replace them the following year.

When seeds of the *Trachelium* cannot be procured, the plants may be increased by off-sets or cuttings, which may be taken off almost at any

season of the year. These should be planted in pots filled with fresh undunged earth, and then placed in a shady situation until they have taken root, when they may be turned out into the most sheltered situations of the garden, where they should be planted in clumps of four or six plants, at about eighteen inches' distance from each other—so that when they grow up they appear as one large plant; and their flowers, although small, are so numerous as to form a mass of blue corollas, each sending forth a style considerably longer than the corolla, which, being headed by a small globular stigma, adds greatly to the beauty of the flowers.

Where seeds can be procured, they should be sown in autumn, soon after they are ripe, for when they are kept out of the ground till spring, they frequently fail, or if they do grow, it is not before the following spring. When the plants come up, they should be kept clean from weeds; and as soon as they are big enough to be removed, they should be transplanted on an east-aspected border of light, undunged earth. In the autumn they may be transplanted into the quarters of the parterre, where they will flower the following summer, from July to September.

Both scientific and vernacular appellations have been suggested, by the long tube or neck of the corolla; *Trachelium* being derived from Τραχεῖλος,

the neck. The French call this plant *Trachélie*; and if our poets are debarred from mentioning this pretty flower in their songs, on account of the unharmonious name of Neck-wort, let them adopt that of *Trachelium*, or even sing its praises under a new title, rather than continue to overlook this emblem of neglected beauty.

SWALLOW-WORT. *Asclepias.*

Natural Order *Contortæ*. *Aponiceæ*, Juss. A Genus
of the *Pentandria Dignynia* Class.

With us ther was a Doctour of Phisike ;
In all this world ne was ther non him like,
To speke of phisike and of surgerie ;

He knew the cause of every maladie,
Were it of cold, or hote, or moist, or drie,
And wher engendred, and of what humour :
He was a very parfite practisour.

CHAUCER.

THESE plants are named Asclepias, from Æsculapius, the God of Medicine, who is said to have discovered its virtues, and to whom one of the species was anciently consecrated ; and it has therefore been made the emblem of medicine.

It has also had the compound name of *Vincetoxicum*, Tame-poison, or Master-poison, bestowed on it, on account of its being esteemed as an alexiphamic.

The English name of Swallow-wort is from the Dutch *Swaluw-wortel*; and that is a translation of the old appellation *Hirundinaria*, under which it is found in the works of Otho Brunfelsius, and

some other botanical authors, who wrote about the end of the fifteenth and beginning of the sixteenth centuries. The idea of this name originated from a fancied resemblance of the follicles or seeds to a swallow flying.

Of the thirty-four species of Swallow-wort described in Martyn's edition of Miller, only two are European plants, the remainder having been collected from the East Indies, Africa, and America.

The Officinal Swallow-wort, *Asclepias Vincetoxicum*, is a native of most parts of the continent of Europe, and it is remarked by Linnæus as being singular that it should not be found wild in Great Britain. Dr. Turner describes this plant, and writes at some length on its medicinal properties, in 1564, but says he had not seen it in England; therefore its introduction to this country appears to have been between that time and the year 1596, when Gerard tells us that it was growing in his garden, together with the Black Swallow-wort, *Asclepias Nigra*, which is indigenous to the South of France, the mountains about Nice, and Spain. This author says "our London gentlewomen haue named it Silken Cislie," from the seeds being surrounded with a white substance resembling silk.

These plants flower from June to September; they have no great beauty to recommend them to

the parterre, but it is curious to observe the irritability of these flowers, which is such, that when a fly enters the calyx to search for honey in the nectary, the petals are immediately contracted, and the insect remains imprisoned for life. At other times they may be seen caught by the leg in such a manner as not to be able to extricate themselves without paying the loss of a limb as a price for their ransom.

The Variegated Swallow-wort, *Asclepias Variegata*, was one of the earliest American plants brought to this country ; and as Gerard wrote his Herbal at the interesting period when colonies were first sent out to the new world, we cannot refrain from giving extracts from his History of Plants, to show what interest was then taken by the English in forming these settlements, and the general idea entertained of the native Americans and their country. Gerard says the savages call this plant *Wiasanck*. “ It groweth in the countries of Norembega, and now called Virginia, by the H. Sir Walter Raleigh, who hath bestowed great summes of monie in the discouerie thereof, where are dwelling at this present Englishmen, if neither vntimely death by murdering, or pestilence, corrupt aire, bloodie fluxes, or some other mortall sicknes hath not destroied them.” In the description of this plant he says, “ the flowers come foorth

at the top of the stalks, which as yet are not obserued, by reason the man that brought the seeds and plants heereof did not regard them: after which, there came in place two *pods*, sharpe pointed, like those of our Swallow-woort, but greater, stuffed full of most pure silk, of a shining white colour; among which silke appeereth a small long toong, (which is the seede) resembling the toong of a birde, or that of the herbe called Adder's-toong. The *pods* are not onely full of silke, but every nerue or sinewe wherewith the leaues be ribbed, are likewise most pure silke; and also the pilling of the stems, euen as flaxe is torne from the stalks. This considered, behold the iustice of God, that as he hath shut vp those people and nations in infidelitie and nakednes, so hath he not as yet giuen them vnderstanding to couer their nakednes, nor matter wherewith to do the same; notwithstanding the earth is couered ouer with this silke, which daily they tread vnder their feete, which were sufficient to apparell many kingdomes if they were carefully manured and cherished." The flowers of this species of Swallow-wort are of a pale dusky flesh-colour, and of an agreeable scent.

The seeds of the Virginian Swallow-wort, *Asclepias Syriaca*, were sent from Virginia to Parkinson, previous to the year 1629. This author calls the plant Virginian silk, on account of the silkiness

of the cotton. This cotton is collected by the settlers in North America to fill beds and mattresses, and the tender shoots of this species are eaten in the spring as we eat asparagus. The flowers are so odoriferous as to make it very agreeable to travel in the woods, especially in the evening, when the odour is more powerfully exhaled.

In Canada, these flowers are gathered in the morning while covered with dew, for the purpose of making a sugar from them.

Kalm tells us that the stalks of this plant dye a good olive colour.

The Tuberous-rooted Swallow-wort, or Orange Apocynum *Asclepias Tuberosa*, is a very ornamental plant, on account of the bright orange colour of its flowers, that shine with a fiery brilliancy during the months of July, August and September. This species of Swallow-wort is common in most of the states of America, where it goes by many denominations ; such as "Butterfly-weed," from being a favourite resort of the insects of that tribe ; it is also called "Pleurisy, or Ache-in-the-side plant," from its medicinal virtues, said to be of considerable activity.

With us this plant sends up a stem about a foot in height, but Mr. Pursh tells us that he found it growing on mounds of sand, which had been gradually accumulated by the winds to a considerable

height, having a root which descended to near two fathoms in depth ; and in such spots the stems were from two to three feet high, or more.

These large tuberous roots require to be planted in a warm, dry, and sheltered situation, where the mould is light or of a sandy nature, and when the roots have become large they should not be transplanted. It is generally raised from imported seed, but in favourable seasons it sometimes perfects its seed in this country. This species was cultivated in the Royal Garden at Hampton Court as long back as the year 1690.

Those whose grounds are more of a swampy than a dry nature, may cultivate the Rose-coloured Swallow-wort, or Water Silkweed, *Asclepias Incarnata*, which grows naturally in swampy places, and on the banks of rivers in North America, and flowers in July and August. It was first cultivated in this country in the year 1710, and is an ornamental plant for the borders of lakes or ponds.

LOBELIA. *Lobelia.*

Natural Order *Campanaceæ*. *Lobeliaceæ*, Juss. A Genus of the *Pentandria Monogynia* Class.

MONSIEUR Charles Plumier, an eminent French botanist of the time of Louis the Fourteenth, gave the name of Lobelia to this family of plants, in honour of Matthias Lobel, of Lisle, who was appointed botanist and physician to James the First of England; and who had also the superintendence of Lord Zouch's botanical garden at Hackney, during the latter part of the reign of Queen Elizabeth.

Mr. Aiton enumerates thirty-four species of Lobelia, in the *Hortus Kewensis*, eighteen of which are natives of the Cape of Good Hope, and seven belong to America, three of which are ranked amongst the most favourite flowers of the curious florists.

The Cardinal's Flower, *Lobelia Cardinalis*, was introduced to the British parterre in the unhappy reign of Charles the First, whose herbalist (Parkinson) mentions it as a "brave plant," in his

"Garden of Pleasant Flowers," which he dedicated to Henrietta, the queen of that monarch. We presume it was called the Cardinal's Flower on account of the bright red colour of the corollas. This beautiful plant grows naturally by the side of rivers and ditches in most parts of North America, as well as in Virginia.

Justice was so delighted with this plant in the year 1754, that he recommends it as "a flower of most handsome appearance, which should not be wanting in curious gardens, as it excels all other flowers I ever knew in the richness of its colour." Had this Scotch gentleman lived to have seen the two beautiful species that have been since introduced, his rapture would have been increased, as the Resplendent Lobelia, *Fulgens*, and the Shining Lobelia, *Splendens*, are still more brilliant than the *Cardinalis*. The European florists are indebted to those illustrious travellers Humboldt and Bonpland for both of these magnificent species of Lobelia, as the seeds were found in the specimens which they brought home with them from Mexico. The former species reached this country in 1810, and the latter was first brought from Paris in the year 1814. The splendid colours of these plants soon ensured them a situation in almost every conservatory, from whence they have been procured to grace the more humble window of the cottage florist, but they have

not yet very generally found their way into the parterre, although they are sufficiently hardy to stand the open garden, where they would contribute much to the gaiety of Flora's garland by their tall spikes of crimson flowers, which continue in blossom from July to the end of September; and when they are cultivated with care, they assume a degree of magnificence that is scarcely surpassed by any other plant.

Mr. W. Hedges has brought them to the highest state of perfection, having grown them from five to six feet in height, with a stem six inches in circumference, and each plant sending up sixteen or seventeen of these grand spikes of beautiful flowers. J. Sabine, Esq., relates the manner of Mr. Hedges' successful mode of cultivating these plants, as follows:—" In October he takes off the suckers which are thrown up from the roots of the old plants, and puts them into small pots, one in each pot, and keeps them in a cold frame till the middle of January: he then removes them into a cucumber frame, where the heat is kept up to sixty-five degrees of Fahrenheit's scale, by linings of hot dung; a pine succession stove of the same temperature will equally suit them. In the middle of February, they are shifted into pots a size larger; and at the end of March, or in the beginning of April, they are again moved into larger pots, and in the middle

of May they are a third time shifted ; the pots to be used for this last shifting are twelves. As soon as the plants are well rooted, after the last removal, they are carried into a peach-house or green-house, in which they continue till they flower, and are hardy enough to bear the open air. When they are preparing to throw up their flowering stems, and during their growth, it is necessary that they should be kept very moist, which is effected by putting pans under the pots, and keeping the pans constantly filled with water. The plants thus managed, begin to flower early in July, and the spikes continue to blow, and are covered with flowers through the autumn."

The compost used in the pots is formed of equal parts of brown or yellow loam, and of leaf or bog mould, to which is added sand, equal to one-fourth of the previous composition, the whole being well mixed together.

The French florists tell us that when these plants are raised from seed, it should be sown as soon after it is ripe as possible, in earthen pans ; the earth to be thoroughly moistened, and after it has imbibed the water, the seed is to be spread over it without being covered. These pans must be sheltered from the frost, and about the month of April or May the plants may be transplanted, and they may be expected to flower the second year.

These plants are readily increased by suckers or cuttings, if kept moist and in a shady situation until they have taken root.

There are varieties of these plants with a pale rose-colour flower.

The foliage of the Splendid or Shining Lobelia is beautifully marked with dashes of a rich puce colour, which, together with the claret-coloured flower-stalks, adds greatly to the beauty of the plant.

As the Lobelia or Cardinal's Flower has not yet been used in the emblematical language of flowers, we have placed it in our Dictionary as the symbol of distinction.

In the wind and tempest of fortune's frown,
Distinction, with a broad and powerful fan
Puffing at all, winnows the light away.

SHAKSPEARE.

HAWKWEED. *Hieracium.*

Natural Order *Compositæ Semiflosculosæ. Cichoraceæ,*
Juss. A Genus of the *Syngenesia Polygamia Æqualis* Class.

Dost thou love hawking? Thou hast hawks will soar
Above the morning lark. SHAKSPEARE.

We present the Hawkweed as the emblem of quick-sightedness, because the Greeks gave it the name of *Iegaxion, Accipitrina*, from a belief that hawks sharpened their sight with the juice of these plants, from which cause it is also called Hawkweed in English, and *Epervière* and *Herbe à l'Epervier* in French.

Coles, in his History of Plants, dated 1657, says, "I shall treat of this plant as appropriated to the eyes; and Dale tells us that, taken inwardly, the Hawkweed sharpens the sight, and expels black bile."

L'Estrange says, "Nothing so fierce but love will soften, nothing so sharp-sighted in other matters, but it throws a mist before the eyes on't."

May we not, therefore, recommend this plant as a remedy for those whom Cupid has rendered blind!

The Hawkweed was held in high estimation by our ancestors who lived before the art of falconry was banished by the invention of gunpowder ; for, in those early days the care of the falcons was considered as a place of great trust, and noblemen did not in those times consider it a degradation to prepare the meat for their falcons, as we learn from Peacham, who says, " It can be no more disgrace to a great lord to draw a fair picture than to cut his hawk's meat." The Duke of St. Albans is hereditary grand falconer of England, which post has been attached to that noble title as long back as the year 1250.

At what period the art of falconry was first practised in this country is not known. Mr. Pennant says, " I cannot trace the certainty of falconry in our country till the reign of King Ethelbert, the Saxon monarch, in the year 760, when he wrote to Germany for a brace of falcons which would fly at cranes, and bring them to the ground, as there were very few such in Kent." This was one of the field sports which the dames of high rank were allowed to partake of. Prior observes,

A falc'ner Henry is when Emma hawks ;
With her of tarsels and of lures he talks.

And Shakespeare says,

Whereas the king and queen do mean to hawk.

The laws which have been made in modern times for the preservation of game are not more severe than those instituted by our forefathers for the security of their hawks. In the 34th of Edward the Third it was made felony to steal a hawk; and to take its eggs, even in a person's own ground, was punishable with imprisonment for a year and a day, besides a fine at the king's pleasure: in the reign of Queen Elizabeth the imprisonment was reduced to three months, but the offender was to find security for his good behaviour for seven years, or to remain in prison till he could find a friend who would be answerable for his conduct.

Falconry appears to have been of great antiquity in the eastern parts of the globe, since our earliest accounts of China notice the practice of this art in that country. Marco Polo, who visited China in the year 1269, tells us, that he witnessed the emperor enjoying this diversion attended by his grand falconer, and a thousand subordinate persons in his train; and that the emperor often carried a hawk on his hand to let fly at any game which might present itself, which were usually pheasants, partridges, cranes, or quails.

It is generally supposed that this mode of hunting originated in Scythia, and that it passed from thence to the northern parts of Europe. Tartary is even at present celebrated for its fine breed of

falcons ; and the sport is in such general esteem, that, according to Olearius, there was no hut but what had its eagle or falcon ; for even the king of birds may be trained to hunt, and they have frequently been used for the chase of the roebuck, the antelope, the wolf, the fox, and other animals that are fleet of foot. Such is the swiftness of the stronger kinds of the feathered race, that it is recorded of a falcon belonging to a Duke of Cleve, that it flew out of Westphalia into Prussia in one day ; and in the county of Norfolk a hawk has made a flight at a woodcock near thirty miles in an hour.

Scaliger asserts, that he saw a falcon belonging to Henry, King of Navarre, strike down a buzzard, two wild geese, divers kites, a crane, and a swan. Thus we cannot be surprised that men in early days should avail themselves of the assistance of these birds of prey in procuring food for themselves ; and that it was a practice of great antiquity there can be no doubt—for, although it does not appear to have been practised by the early Greeks or Romans, on account of the first devoting themselves to the arts of agriculture, and the latter to that of war, yet their authors mention it as the custom of other countries. Pliny tells us, in his Natural History, that in a part of Thrace beyond Amphipolis the inhabitants used hawks to catch birds ; and this

appears to have been more a practice of necessity than amusement. He mentions that the men beat the woods, bushes, and reeds, to spring the game, when the hawks flew over them, and beat them to the ground, so that they were easily taken by the hand. And that the hawks were properly trained in those days, we learn from his stating, that, during the season for hawking, these birds would give the falconers signs, by their manner of cry and flying together, that there was good game abroad, and thus draw them to the field.

Falconry seems to have continued in high repute in England, till about the time of the Usurpation, after which it gradually declined; but so late as the reign of James I. it was pursued with such ardour, that Sir James Monson is said to have given a thousand pounds for a cast of hawks, which was an amazing sum, when we take into consideration the value of money in that day.

We have been led into this digression by having lately witnessed the revival of this ancient recreation. But to return to the plant that has, by its name, called forth these brief remarks on the sports of our ancestors.

We have no less than eighteen native species of this genera of plants, and Martyn mentions thirty-seven exotic species, most of which are regarded as weeds. M. Pirolle mentions another species,

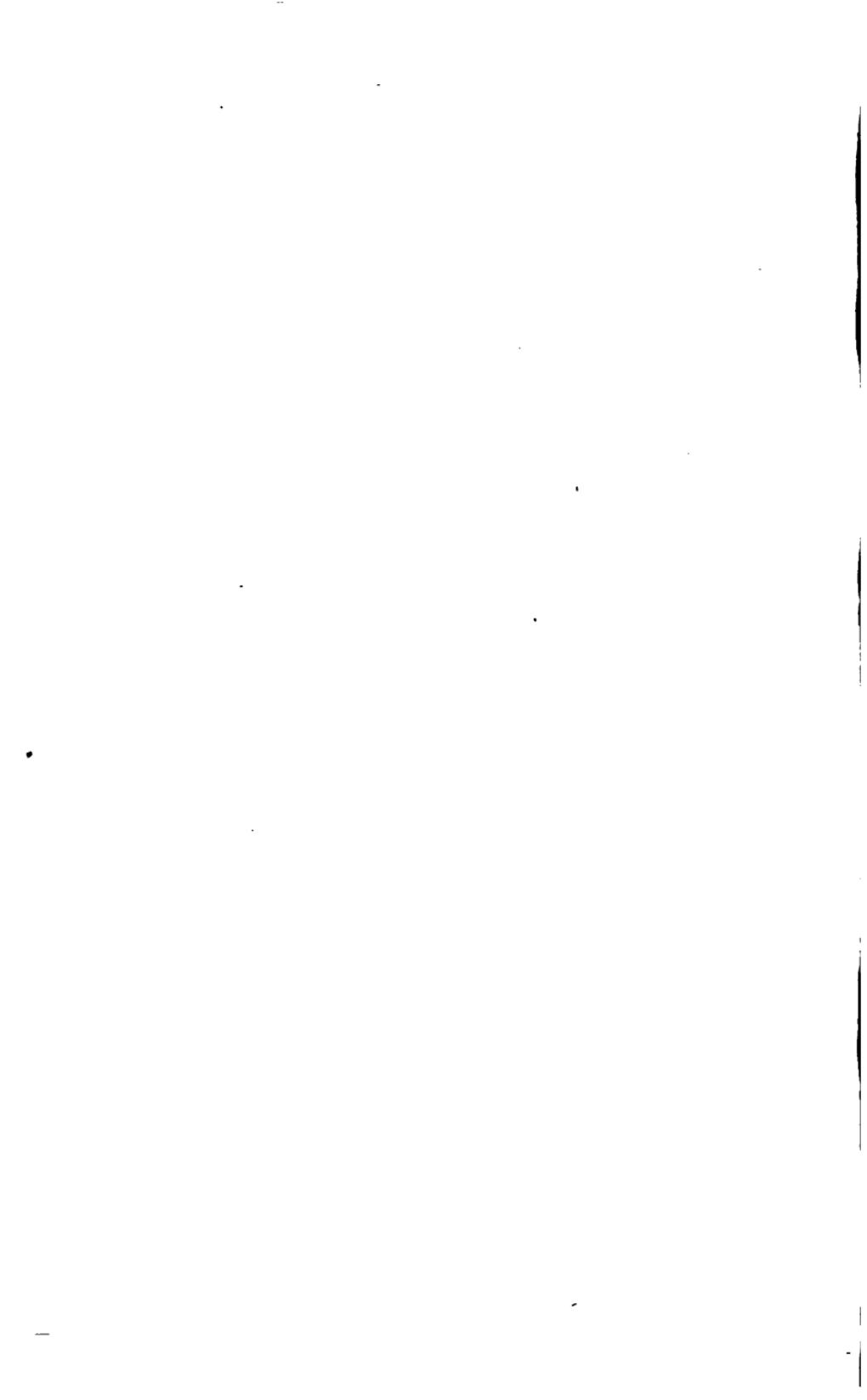
under the title of *Hieracium Eriophorum*, which, he says, grows in the sands, on the borders of the sea near Bourdeaux and Bayonne, and is a very beautiful flower, although it has not yet found its way into the gardens of either the amateur or professional florists. The species generally cultivated in the English parterre, is the *Auranticum*, or Orange-flowered Hawkweed, frequently called Golden Mouse-ear, and Grim the Collier, when it varies with a dark-coloured flower; for this species sports considerably in colour, some plants producing red, and others a bright orange, or pale yellow, flowers. This creeping perennial plant grows from one to two feet in height, and has an agreeable rustic appearance when in flower, which continues from Midsummer to the end of Autumn. It grows naturally in Scotland, and is also a native of France, Switzerland, Austria, and Silesia.

It is propagated by parting the roots in the spring, or by seed, which should be sown in March, on a border with an eastern aspect. The young plant will be ready for transplanting in June: they prosper best in a substantial soil, free from dung; for when the earth is either richly manured, or too moist, the plants are apt to perish in the winter.

This species of Hawkweed may be planted in clumps to divide China Aster, or other flowers,

whose height and colour is calculated to create harmony with these orange-coloured blossoms; but, from its rusticity, it seems better calculated for the foreground of the shrubbery than the parterre.

A U T U M N.



A U T U M N.

Autumn, nodding o'er the yellow plain,
Comes jovial on.

THOMSON.

And you—in gay variety that grace,
In later months, with beauty the parterre,
Making a sunshine in the shady place,
As Una and her milk-white lamb were there.

BARTON.

IN the baronial days of our ancestors, Flora seldom lengthened her reign in these realms beyond the end of the summer months; but since floriculture has been so justly appreciated as one of the most refined and rational amusements for the leisure hours of peace and tranquillity, the fair goddess has been pleased to continue her smiles on this happy island throughout the year.

In the history of the plants which we have to describe under this season, it will appear that nearly all the flowers which grace the autumnal parterre have been borrowed from warmer climes, and, through the art of our florists, have been naturalized and made to flourish in this northern part of the globe, so as to lengthen the appearance of summer

by the gaiety they give to the pleasure-grounds, and thus detain Flora in the open garden, until

The radiant ruler of the year
At length his wint'ry goal attains,
Soon to reverse the long career,
And northward bend his steady reins.

The Floral Queen then holds her court under the crystal temples that her numerous votaries have erected for her security against the attacks of Boreas.

'Tis a bower of Arcadian sweets,
Where Flora is still in her prime,
A fortress to which she retreats,
From the cruel assaults of the clime.

While earth wears a mantle of snow,
There Pinks are as fresh and as gay
As the fairest and sweetest that blow
On the beautiful bosom of May.

The beauties of autumn formerly consisted of the change which then takes place in the tints of the foliage of trees and plants. Akenside says—

Autumn tinges ev'ry fertile branch
With blooming gold and blushes like the morn.

To these beauties is added the glowing colours of ripened fruits, which have called forth the lively effusions of the poets of all ages. Horace observes, in the Fifth Ode of his Second Book,

Autumn soon, of various dyes,
Shall with kinder warmth arise,
Bid the livid clusters glow,
And a riper purple show.

Donne tells us, in poetical numbers,

No spring or summer's beauty hath such grace,
As I have seen in one autumnal face.

Pope seems equally to have regarded these grand changes of nature ;

Not the fair fruit that on yon branches glows
With that ripe red th' autumnal sun bestows.

And since to these numerous autumnal dyes which nature throws over the plants of our country, we have added the brilliant colours which the sun bestows on the plants of China's flowery vales, and the more gaudy beauties of African shores, together with the vivid tints of the flowers of Columba's land, we may safely exclaim, in the words of Waller,

No, not the bow, which so adorns the skies,
So glorious is, or boasts so many dyes !

HOLLYHOCK. *Alcea Rosea.*

Natural Order *Columniferæ*. *Malvaceæ*, Juss. A
Genus of the *Monadelphia Polyandria* Class.

— From the nectaries of Hollyhocks
The humble bee, e'en till he faints, will sip.
H. SMITH.

THE cultivation of this magnificent Eastern plant is of great antiquity in this country. Its noble size, majestic height, and splendid flowers, could not fail to attract the attention of our earliest collectors of exotic plants; and although we cannot state the time when the Hollyhock was first brought to this country, it was certainly much earlier than the date mentioned in the *Hortus Kewensis*, or any other modern work on plants that we have been able to consult. Dr. Turner speaks of it as a familiar plant in his work, dated 24th June, 1564; and Gerard, in 1597, observes that it was then sown in gardens almost everywhere.

The derivation of the English name of this flower may be traced to the Saxon language, the old name of Holyoak being the same as Holihec.

Mortimer retains the old name of Holyocks for

these plants, in his work on husbandry, as late as the year 1707, wherein he says, "Holyocks far exceed Poppies for their durableness, and are very ornamental." Turner spells it Hollyhock; and Gerard, and after him Parkinson, call it Holli-hocke.

The French, who consider this plant as a native of Syria, call it by several different names, as *Rose trémière*, *Rose d'outre-mer*, *Rose de mer*, *Rose de Damas*.

Botanists have named it *Alcea*, from the Greek word *Αλκη*, on account of its supposed medicinal strength in curing the dysentery, &c., for which it was formerly held in great repute.

In floral language the Hollyhock is figured as the symbol of Fecundity, and its extreme fruitfulness seems to justify the device.

These plants grow naturally in various eastern parts of the globe. It is common in China, from whence the seeds of the tall, as well as the dwarf, Hollyhock have been frequently received. Pliny speaks of this flower in the fourth chapter of his twenty-first book, where he describes it as a rose growing on stalks like the Mallow; and Miller says he received seeds of these plants from Istria, where it was gathered in the fields; but these seeds produced single red flowers only, whereas from the seeds procured from Madras he raised

plants with double flowers of many different colours.

A late traveller in Africa says, the Hollyhock is also a native of the Marootzee country, where he found it growing wild among the rocks around Kurreechane ; but these appear to have been only of a yellow colour.

Linnæus ascribes the Hollyhock to Siberia ; and as we have at different times received seeds from all the various places where it grows naturally, we have not only procured all the varieties which these countries produce, but by bringing them together into one spot, so that the several kinds have been impregnated by each other, we have procured a greater variety in their colours than is to be found in any one country where it grows spontaneously. Many of the colours of these flowers have been changed by accidental circumstances ; and that the corollas have become doubled by the art of cultivation, there can be doubt in the mind of the florist who has regarded the formation of the flower. Miller says, although the varieties of the double Hollyhocks are not constant, yet where the seeds are carefully saved from the most double flowers, the greatest number of the plants will arise nearly the same as the plants from which they were taken, both as to their colour and the fulness of their flowers, provided no plants with

single or bad colours are permitted to grow near them. Therefore, so soon as any such appear, they should be removed from the good ones, that their farina may not spread into the other flowers, which would cause them to degenerate.

We have but few flowers that contribute more to the embellishment of large gardens than the Hollyhock, although their hardy nature and easy propagation have rendered them so common that they are much less regarded by the generality of florists than they deserve, since it yields to no flower for the grandeur and beauty of its appearance, as well as the great variety of its colours, which embraces all the shades of the Rose, from the palest blush to the deepest carmine: and from a pure white the yellows are equally numerous, until they reach to the richest orange, from which the colour is carried on to a dark chesnut. Others are dyed of a pale reddish purple, running up to a black.

The noble stalks which these plants send up, like so many floral banners garnished with roses, render the Hollyhock particularly desirable for ornamenting the borders of plantations, and for giving gaiety to the shrubbery in the later season of the year, since it generally continues its succession of flowers until the frost warns the floral goddess to depart.

The florist who is possessed of taste will not reject the Hollyhock because it so familiarly flourishes in the rustic gardens of the cottagers, as it will be found equally appropriate for the decoration of the most princely grounds, if properly dispersed and grouped, so as to give effect, and receive assistance from other plants; for it readily displays its eastern splendour, whilst many of the exotic plants, that are so eagerly sought after, show that they are

Borne from *their* native genial airs away,
That scarce can *their* tender bud display.

The tall Hollyhock is not adapted for the small parterre,—its aspiring height befits it for a nobler situation, and it rises with a degree of dignity from amongst clumps of flowering shrubs that is not excelled by any plant whatever. But to give full effect to this flower, they should be planted in clumps of from five to ten plants, according to the size of the grounds; and each of these clumps should be formed of one colour, contriving to have a clump of the darkest-coloured flowers between two plantations of the paler colours. Where the grounds are very extensive, clumps of mixed varieties may be admitted, but these never tell so well in the perspective as a mass of a single colour. It considerably adds to the beauty of these plants when they are so placed as to appear emerging

from among dwarf shrubs, where the lower part of the stalks are obscured. They must not be planted too near each other, as every stem of flowers should be seen distinct ; and when they require support, they should each have a separate stake—for when several are pressed together, the flowers have not room to display their beauty, and they take a stiff and unnatural appearance, instead of that careless freedom which constitutes the beauty of all plants.

Yet in this wild disorder art presides,
Designs, corrects, and regulates the whole,
Herself the while unseen.

MASON.

The vulgar planter, who has no idea of the beauty of perspective gardening, frequently plants his Hollyhocks in rows ; this is one of the errors never seen in nature, and has as bad an effect in the garden as a straight line of Lombardy Poplars in a plantation, or a long rank of soldiers painted in a landscape picture.

The Hollyhock may be planted so as to ornament the bounds of gardens, by forming clumps at the angles and at irregular distances near the fence, so that they do not form a straight line, for such an arrangement would only make the limits of the ground more conspicuous. For small gardens, or where the situation is much exposed to the

winds, the dwarf Hollyhock is the most desirable ; and when some of these are planted in front of the taller kind, it adds considerably to the beauty of the group. When the children of the lower classes of society have become more civilized, and their parents sufficiently enlightened to instruct them in their duty, so that their amusement may not consist in idly destroying what cannot benefit them, but materially injures their more polished neighbours, the Hollyhock will be planted in the hedges of our fields, and the whole appearance of the country be much improved by relieving the uniformity of the generality of fences. Considerable benefit would, at the same time, be received by those cottagers who have the prudence to give attention to the hive,—since the late season at which the Hollyhock flowers, gives the bees an opportunity to make a second season for collecting their sweets ; and when a wet or cold summer has impoverished the hive, or brought sickness into the swarming community, these autumnal flowers will afford them relief, and give them strength to endure the winter, which is also considerably shortened by these flowers enabling them to subsist without falling on their store at too early a season.

The ancients attended their bees with so much care, that the hives were conveyed in the night to

distant spots abounding with such plants as afforded the most honey*; and surely it is easier to plant flowers for the bees than to take the bees to the flowers. These industrious insects have peculiar claims on the care of the peasantry, since they stray into the grounds of the wealthy, where, without committing devastation or fraud, they obtain treasure for their master; and are therefore a kind of licenced flock, which feed at freedom, without the fear of giving offence or receiving imprisonment, for they neither break down fences nor transgress against the laws.

It may be stated that the demand for honey is much less than in ancient times; but we would ask if both the honey and the wax do not bring as good a price as formerly; and bees, therefore, as well deserving the attention of the poor now, as they were at any former period? We have frequently remarked that where the hive has been seen in the cottage-garden, the inhabitants seem possessed of more domestic comforts than those who neglect to secure a swarm of bees; and we have known several industrious families entirely clothed by the profits which they obtained from the sale of their honey and wax.

The Hollyhock is also likely to hold a higher

* See *Sylva Florifera*, vol. i. p. 157; and *Cultivated Vegetables*, vol. ii. p. 330.

rank in rural economy than that of feeding bees. For some years past it has been known that a good strong cloth may be made from the fibrous bark of the flower-stalks of this plant and in the year 1821 ; about two hundred and eighty acres of land, near Flint, in Wales, were planted with the common Hollyhock, with the view of converting the fibres of this plant into thread similar to that of hemp or flax. In the process of manufacture, it was discovered that the plant yields a fine blue dye, equal in beauty and permanence to the best indigo. This important discovery cannot fail of producing beneficial consequences, both in a commercial and agricultural point of view.

The receptacles containing the seed of these plants should be collected when ripe in dry weather, and placed in situations where they will receive no damp during the winter : these may be sown about the middle of April, in beds of light earth, from which the young plants may be removed when they have six or eight leaves each, into nursery beds, placing them about twelve inches from each other, observing to water them, should the season be dry, until the plants have taken root : they should be then kept free from weeds until October, when they may be planted out where they are to remain. We have sometimes been successful in sowing the seeds as soon as they are ripe in the autumn ; and by

planting them out early in the spring, have obtained flowers a year sooner than could be procured from the spring sowing.

The flower-stalks of the choicest varieties of Hollyhocks should be cut down to the earth when the beauty of the flowers is decayed, for if suffered to mature the seed, it frequently impoverishes the plants so much that they decay during the winter; and a single stalk of these emblems of fecundity will yield sufficient seed for a large garden.

SUN-FLOWER. *Helianthus.*

Natural Order *Compositæ Oppositifoliæ. Corymbiferæ,*
Juss. A Genus of the *Syngenesia Polygamia Frust-*
tranea Classa.

Uplift, proud Sun-flower, to thy favourite orb
That disk whereon his brightness loves to dwell ;
And as thou seem'st his radiance to absorb,
Proclaim thyself the garden's sentinel.

BARTON.

THIS Peruvian plant has been named *Helianthus*, from Ήλιος, the sun, and ἄνθος, a flower, because its magnificent corolla bears a resemblance to the great luminary of day; and on this account it was used in the religious ceremonies of the ancient Peruvians who worshipped the god of day,—the virgins, who officiated in the Temple of the Sun, being crowned with the *Helianthus*, made of pure gold, and wearing them also on their breast, and carrying others in their hands, which, reflecting the rays of their deity by the brilliancy of the metal, formed an effect of the most imposing grandeur.

The Spaniards, who were amazed at this display of gold, were still more astonished when, in May, they saw the fields covered with these flowers,

which had been so closely imitated by the artificers of the New World, that the precious ore appeared less admirable than the workmanship in the eyes of these rapacious conquerors.

The Sun-flower is made the emblem of false riches, because gold of itself, however abundant, cannot render a person truly rich. It is related of Pytheus of Lydia, that, possessing valuable mines of gold, he entirely neglected the cultivation of his lands, which naturally became so unproductive as not to afford the common necessaries of life. His wife, who showed herself possessed of as much good sense as wit, at a banquet supper which Pytheus had ordered to be prepared, directed that all the dishes should be filled with gold in different shapes and states instead of viands. On the removal of the covers this ingenious woman exclaimed to the guests, "I set before you what we have in greatest abundance, for we cannot reap what we do not sow." This lesson made a proper impression on the mind of Pytheus, who acknowledged that Providence distributes her various riches like a tender mother, who has love for all her offspring, however numerous.

The gaudy Sun-flower naturally brings to mind the enormities which the treacherous Spaniards committed on the plains where this plant springs spontaneously, led on by the most ravenous app-

tit for plunder, and commanded by that blind bigotry and superstition which darkened the Old World in those days. Those infatuated pillagers attempted to enlighten the unfortunate heathens, who, in the simplicity of their hearts, poured out their adorations to the sun as the grandest object which their imagination could conceive. And their glaring and favourite flower will ever remain as a memento of the folly of those who attempt to inspire the ignorant with an idea of pure religion through the assistance of craft and cruelty.

Had the Spaniards returned to Europe loaded with plants and seeds, which would have been an excitement to industry, instead of gold and precious stones, which naturally lead kingdoms as well as individuals, to voluptuous idleness, the Spanish nation might at this period have been one of the most wealthy and happy kingdoms in Europe, instead of being impoverished by pride and depopulated by dissension.

The first mention we have of the annual Sun-flower in this country is by Gerard, who notices it in the year 1596, under the name of "The Flower of the Sunne, or the Marigolde of Peru." He tells us, that it had grown to the height of fourteen feet in his garden at Holborn, producing flowers that measured sixteen inches over; and he adds, that in Spain this plant has been known to reach the height of twenty-four feet.

The French call this flower *Soleil* and *Tournesol*, from a vulgar error that the blossoms turn to the sun, whereas the flowers branch out on all sides of the plant, and those which face the east at the opening of day never turn to the west at the close of it, although our poet of the Seasons evidently was of the popular opinion that the *Helianthus* flower regularly turned to the sun.

Who can unpitying see the flowery race,
Shed by the morn, their new-flush'd bloom resign
Before the parching beam ? So fade the fair,
When fevers revel through their azure veins.
But one, the lofty follower of the sun,
Sad when he sets, shuts up her yellow leaves
Drooping all night, and, when he warm returns,
Points her enamour'd bosom to his ray.

Moore introduces the same allusion in his Irish Melodies :—

As the Sun-flower turns to her god when he sets
The same look which she turn'd when he rose.

These poetical ideas seem borrowed from Ovid's transformation of Clytia :—

But angry Phœbus hears, unmoved, her sighs,
And scornful from her loath'd embraces flies.
All day, all night, in tractless wilds alone
She pined, and taught the list'ning rocks her moan.
On the bare earth she lies, her bosom bare,
Loose her attire, dishevell'd is her hair.
Nine times the morn unbarr'd the gates of light,
As oft were spread the alternate shades of night,—
So long no sustenance the mourner knew,
Unless she drank her tears, or suck'd the dew :

She turn'd about, but rose not from the ground,
Turn'd to the sun still as he roll'd his round ;
On his bright face hung her desiring eyes,
Till fix'd to earth she strove in vain to rise.
Her looks their paleness in a flower retain'd.

From hence it has been surmised that "the jealousy Clytia gave her yellowness and attitude to the Sun-flower."

The annual Sun-flower is unfit for the small parterre, but when planted amongst shrubs or young trees, or on the borders of woods, its imitative suns shine to advantage. It is a flower we recommend to the notice of the young students in botany, since its great size will enable them to understand the class and order in which it is placed better than any other plant of the same class.

Linnaeus adopted the term Syngenesia for this class of plants, from *συν*, together, and *γενεσις*, a generating, meaning to generate together; and as it includes all the compound flowers, from the modest Daisy to the gay Dahlia, it forms one of the most interesting classes. It contains a natural order of plants perfectly distinct from any others which the vegetable creation presents to our view; consequently, their arrangement in the artificial system of the illustrious Swede is peculiar to themselves. This class could not be defined by the number of stamens and pistils, since all the numerous genera contain the same, which made it necessary to find

other characters in the flowers so as to form the bases of subdivision. For this purpose Linnaeus adopted the polygamy, or intermixture of the sexes in the florets.

The characters of the class Syngenesia being of a decidedly different nature from other flowers may be easily known. It consists, first, in the conge-
ration of the anthers, which is uniform through all its numerous genera ; and, secondly, that more than one floret is always contained in each calyx ; this is sufficient to determine any plant to belong to the 19th class, Syngenesia.

The Sun-flower, more particularly the single one, presents you with a clear idea of the class and order to which it belongs, since you see the parts on a large scale. The common receptacle supporting all the numerous florets on its surface, each of these florets are, in fact, a separate monopetalous flower, having within itself the parts necessary for the formation of seed.

These numerous florets are surrounded by a ray of petals, whose office is to protect the whole of the interior assemblage of flowers, as the houses of a city are surrounded by a wall. This flower is placed in the third order or division of the class Syngenesia, and which order is named Polygamia Frustranea, because the florets of the margin next the petals are neuter, that is, containing neither

stigma nor anthers—which is expressed by the term *Frustranea*, from *frustra*, to no purpose. The florets of the disk or centre of the flower are bisexual, containing a pistil headed by a divided stigma, termed bipartite, which is surrounded by five anthers. Each of these florets is succeeded by a seed; and so numerous are the florets in a large single Sun-flower, that Barchin tells us he has known them contain 2362 seeds in one flower. The more double this flower becomes the less seed it produces, as it becomes double by the change of the tubular into ligular florets, like the petals in the ray, only smaller.

The seeds of the Sun-flower when peeled have a taste similar to sweet almonds, and from their oily nature they are excellent food for fattening domestic poultry; but it is with difficulty they can be preserved from the ravages of the sparrow, who eats them with the greatest avidity, leaving the receptacle like an empty honeycomb.

In the United States of America the Sun-flower is cultivated on a large scale, for the purpose of preparing oil from the seeds, which is good-tasted, and fit for salads, and all the purposes for which olive-oil is used. The whole plant, and particularly the flower, exudes a thin, pellucid, odorous resin, resembling Venice turpentine.

For ornamental purposes the seed should be

saved from the largest and most double flowers, which will be found on the top of the principal stem, those on the side branches being smaller, and frequently having abortive seeds. When the seeds are ripe, the heads should be cut off with a part of the stem, and hung up in a dry airy place for a few weeks, when they may be rubbed out and put into bags or boxes until the time of sowing, which is during the month of March.

The seed should be sown on a bed of common earth, and when the plants are about six inches high they may be removed, with a ball of earth to their roots, and planted where they are to flower; but we prefer setting the seeds where they are to remain, as the plants are generally finer than those that have been removed.

This showy flower is a general favourite with rustic gardeners, which is thus noticed by Clare in his " Village Minstrel :"—

And Sun-flower planting for their gilded show,
That scale the window's lattice ere they blow;
Then, sweet to habitants within the sheds,
Peep through the diamond panes their golden heads.

The Perennial Sun-flower, *Helianthus Multiflorus*, is a native plant of Virginia, and is of long standing in our gardens, since it is both described and figured in Gerard's Herbal, who observes that he had never seen the seed. The Perennial Sun-

flower rarely produces seeds in England, but it is easily increased by parting the roots, and is by far the most desirable kind for ornamenting the shrubbery, since it continues to give out a multitude of flowers from the month of July to the end of October. This plant is remarkable for not being affected by the smoky atmosphere of London, and is one amongst the small number of plants that will flourish in our overgrown capital.

The tuberous-rooted *Helianthus*, or Jerusalem Artichoke, has already been noticed at some length in the first volume of the History of Cultivated Vegetables. America has afforded us eleven other species of the *Helianthus*, which are seldom cultivated excepting in botanical gardens.

CHINA ASTER, or CHINESE STAR-WORT. *Aster Chinensis.*

Natural Order *Compositi Radiati.* *Corymbiferæ* and *Radiati*, Juss. A Genus of the *Syngenesia Polygamia Superflua* Class.

As from a cloud his fulgent head
And shape star-bright appear'd.

The numerous family of radiated flowers were named *Aster*, from the Greek ἀστής, a star. The French call this autumnal flower *Reine Marguerite*, Queen Daisy, and not Queen Margaret, as it is generally translated, *Marguerite* being their name for "the Star-like Daisy." The Chinese generic term for this flower is *Kéang-nam-fa*.

The European parterres are indebted to the missionary, Father d'Iacarville, for the gay robe which this various coloured flower throws over them, during the latter months of Flora's reign,— he having sent the seeds from China to the Royal Garden of Paris about the year 1780, where the plants produced only simple flowers of one uniform colour, but which, through cultivation and change of soil, soon became both so doubled in petals, and

various in colours, that it now forms one of the principal ornaments of the flower-garden from July to November.

Mr. Miller tells us that he first received the seeds from Paris in the year 1731, from which he raised some plants with red and others with white flowers: in the year 1736 he procured seeds of the blue variety, but these were all single flowers. In 1752, he received seeds of the double flowers, both red and blue; and in the following year Dr. Job Baster, of Zirkee, sent him seeds of the double white sort: since which time the varieties have been infinitely increased by means of some kinds being impregnated by the farina of others; and thus we are presented with party-coloured flowers in red and white, blue and white, purple and white, pink and purple, two reds, two blues, and all the changes that these colours are capable of producing,—on which account the China Aster is made the emblem of variety.

The Chinese display a taste in their arrangement of these star-formed flowers, that leaves the British florist far in the background. Even our most curious amateurs have yet to learn what effect these plants will produce by their gay corollas when carefully distributed by the hand of taste.

Let the imagination picture a bank sloping to a piece of water, covered with these gay flowers, so

disposed that they rival the richest patterns of the carpets of Persia, or the most curious figures that the artist in filigree can devise—see these reflected in the liquid mirror below, and some idea of the enchanting appearance which these brilliant stars are thus made to produce in the gardens of China may be conceived.

In no part of the globe is the culture of plants so generally understood as in Great Britain, but we pay too little attention to the manner of disposing flowers in general. After having raised them with the greatest care, they are frequently planted in the most careless manner, and without the least attention to general harmony or design of any kind. A vacant spot is to be filled, and no thought is given how the colour of one flower may be made to assist or diminish the lustre of the neighbouring plants. This is a matter of chance ; and as well might we expect to see a beautiful picture produced by throwing a quantity of gay colours promiscuously on a pannel, as expect a good arrangement of flowers without trouble or attention in their planting.

When the seed of the China Aster cannot be depended on as to what coloured flower it may produce, the plants should be kept in a nursery-bed until the first flower is expanded sufficiently to ascertain its hue ; and then with a transplanting spade they may be removed to such parts of the parterre

as we wish to embellish by any particular hue, or to sites where we intend to display the art of grouping colours. These plants should be allowed sufficient room to extend their branches, but at the same time be planted so near to each other as to hide the earth, and form but one mass of flowers ; and they may generally be planted on

The spot where spring its earliest visit paid :

for by the time these annuals require transplanting, most of the early flowering bulbs will have been taken out of the ground.

It is recommended to preserve the seeds from the flowers of the centre or principal stem only, as the flowers on the lateral branches are never so large or so double, and consequently produce inferior plants. This seed should be sown in the spring, on a warm border, or upon a gentle hotbed ; and when the plants are about three inches high, they should be removed to a bed of rich earth, where they may be transplanted at six inches' distance from each other every way, and kept shaded from the sun and properly watered until they have taken root. In about five weeks they may be again removed to the parterre where they are to flower : but in this last removal, it is necessary to take them up with a good ball of earth about their roots ; and it is desirable that this last removal should be per-

formed in rainy weather, which will prevent their being checked by transplanting. The French gardeners remove the China Asters with a transplanter, such as is used to remove Tulips in flower. The Chinese frequently keep them in pots until they begin to flower, and by this means are able to place them out so as to form an elegant distribution of these floral stars.

The bow of Iris may be imitated by planting these flowers in regular shades, but this must be on a large scale and on a sloping ground, or the effect will be trifling. It may be performed in plantations of young shrubs, before they have acquired a size to cover the ground, as the crescent being interrupted or broken in its progress by the shrubs will rather contribute to than lessen the effect. The upper side of the bow should be finished by a line of yellow Marigolds.

We particularly recommend an abundance of the China Aster to be planted in the shrubbery, since no flower forms so good a contrast with the autumnal tints of trees and shrubs as these emblems of variety.

The young botanist will observe, by comparing this flower with the *Helianthus*, that it agrees in having the florets of the disk bisexual, but differs in those of the radius or margin, which are furnished with a stigma only, but which are made

fertile by the pollen of the centre florets ; and hence it is placed in the order called *Polygamia Superflua*. The marginal florets of the China Aster are usually ligulate ; but we have lately had a beautiful variety introduced, consisting entirely of quilled florets.

DAHLIA. *Dahlia.*

Natural Order *Corymbiferæ*. A Genus of the *Syngenesia Polygamia Superflua* Class.

THIS splendid addition to our autumnal parterres was unknown to the Old World until the year 1789, when it was first sent to Spain from Mexico, where it grows wild in sandy meadows. It was introduced to this country by the late Lady Bute, who procured it from Madrid in the same year that it arrived from America; but either through a want of care or judgment in the cultivation, these plants were entirely lost to our gardens until seeds were re-introduced by Lady Holland, in the year 1804. It is singular that this distinguished flower should have been twice introduced to this country through the ladies of two of our distinguished statesmen; and that the first introduction should mark the year when France became revolutionized; and the second that which saw Napoleon made Emperor of the French nation. From these incidents we present the Dahlia as the emblem of instability.

The Dahlia was but little known in England

until after the year 1814, when the peace enabled our nurserymen to obtain an additional supply both of roots and seed from France, where the cultivation of these plants had been more attended to than, in this country. The Count Lebeur, at Paris, and M. Otto, at Berlin, were the principal foreign amateurs who cultivated the Dahlia previous to 1809. In that year M. Smetz, of Antwerp, procured a few tubers of these plants from Paris, which were the first seen in that neighbourhood; yet, by the superior mode of treatment, the Antwerp Dahlias were those most eagerly sought after in the French capital, in less than eight years after they had been known in the Netherlands. But it was left to English capital and perseverance to illuminate the northern part of the globe by the full brilliancy of these floral luminaries, which now shine as conspicuously in our groves as gas in our towns; and the Dahlia-mania of the nineteenth century, although less dangerous in its effects, has not been less general than the Tulipomania by which our ancestors of the seventeenth century were so much affected.

The ingenuity of the florist has never appeared more conspicuous than in the treatment of this Mexican plant, as through their art these flowers have had their petals doubled and quadrupled, until they have become as full as the China Aster or the

Rose-Centifolia ; whilst their colours have even been more increased than their petals, and display a richness which rivals that of the gaudy Tulip, or the finest tints which the silk-dyer is able to give to the glossy velvet.

The most beautiful varieties of this flower have been raised from the seeds of the single purple Dahlia ; and so numerous are the kinds already become, that some of our nurserymen offer more than two hundred varieties for sale.

The more curious kinds are increased by two different modes ; first, by cuttings, which should be taken from the root shoots in the spring, or from young shoots in the early part of the summer : these when cut smoothly off in the middle of a joint are to be planted in light sandy earth on a moderately hot bed, and covered with glasses. The top leaves of the cuttings should not be removed when planted. These cuttings form tubers and produce flowers during the autumn.

The second mode of increasing choice Dahlias is, by grafting the shoots of valuable plants on the tubers of the roots of more common kinds. Florists are indebted to Mr. Thomas Blake, gardener to James Vere, Esq. of Kensington-Gore, for this ingenious discovery, which he made known to the public through the Transactions of the Horticultural Society of London, in August, 1821. Mr.

Blake says, "not being able to procure plants of double Dahlias, but having opportunities of obtaining cuttings from my brother gardeners, I was induced to try the experiment of grafting them, in preference to striking the cuttings, which is a tedious process. I first attempted it last year, but began too late to succeed well; for unless the new plant form eyes for the succeeding year, it is nothing more than annual; and the work must be done early, to effect this object. In the present season, I have succeeded beyond my most sanguine expectations.

" The cutting intended for the graft should be strong, and short-jointed, having on it two or more joints, or buds; it must be also procured as soon in the season as possible: when obtained, select a good tuber of a single sort, taking especial care that it has no eyes: with a sharp knife (for a dull edge would mangle the fleshy root, make it jagged, and so prevent a complete adhesion) cut off a slice from the upper part of the root, making at the bottom of the part so cut a ledge whereon to rest the graft. This is recommended, because you cannot tongue the graft as you would do a wood shoot; and the ledge is useful in keeping the cutting fixed in its place while you tie it. Next cut the scion sloping, to fit, and cut it so that a joint may be at the bottom of it, to rest on the aforesaid ledge: an

union may be effected without the ledge, provided the graft can be well fixed to the tuber, but the work will not then be so neat. It is of advantage, though not absolutely necessary, that a joint should be at the end of the scion, for the scion will occasionally put forth new roots from the lower joint: the stem is formed from the upper joint; I therefore procure the cuttings with the two lower joints as near together as possible. After the graft has been tied, a piece of fine clay, such as is used for common grafting, must be placed round it: then pot the root in fine mould, in a pot of such a size as will bury the graft half way in the mould: place the pot on a little heat in the front of a cucumber or melon frame, if you chance to have one in work at the time; I prefer the front, for the greater convenience of shading and watering which are required. A striking glass may be put over the graft, or not, as you please. In about three weeks the root should be shifted into a larger pot, if it be too soon to plant it in the border, which will probably be the case; for supposing the work was began in March, the plant cannot go out till the end of May, so that the shifting will be very essential, to promote its growth till the proper season of planting out shall arrive."

J. Sabine, Esq., recommends that the seeds of the Dahlia "should be collected in September

from the dwarf plants, where no preference exists on other accounts, and from semi-double flowers when double varieties are chiefly desired. Perhaps seeds obtained from those particular florets of the disk which have altered their form, may have a greater tendency than others to produce plants with double flowers. Sow in March, or earlier, on a heat of 55° or 56° ; the young plants to be pricked out, if necessary, in pots, and kept in a moderate temperature, say 50° or 55° , till the end of April. Now plant out where they are to remain, covering each plant at night with an empty pot for some weeks, to avoid injury from frost. If in a compartment by themselves, plant in rows three feet wide, and at two feet distance in the row. Seedlings thus treated will blow in July, and continue in perfection till the autumn; but the first frost takes the same effect on the Dahlia as it does on the potato and kidney-bean. A blow may be prolonged by planting in large pots, and removing early in autumn to the green-house."

Dahlias should be planted in open situations, and in a rich loamy soil, or in a mixture of vegetable mould and white sand, as a dry soil suits these plants better than a retentive or wet earth.

The full grown roots of Dahlias should be planted early in April, on the spots where they are to flower; and when the season is cold or frosty,

a little litter or an empty flower-pot should be placed over the roots. To procure an early flowering of these plants, they should be planted in large pots, and kept in frames or a green-house until May, when they may be turned out into the quarters of the garden. The roots of the Dahlia should be taken out of the ground when the frost has affected the foliage and branches; and they are best preserved by placing them in casks or boxes, and then covering them with sand, so that they may not become so dry as to injure the vegetating principle; but they must by no means be kept moist: these boxes or casks may be placed in any out-house or building that will protect them securely from frost.

When the roots are not taken out of the earth, the stalks should be cut off when the frost has rendered them unsightly, and a quantity of litter placed over them for protection.

The Dahlias most admired are those which throw out their branches like a shrub, and are prolific of flowers having short peduncles: the blossoms should be clear and distinct in colour and fully expanded. They are unfit for the small parterre, from the height and size which they generally acquire; and they have the best appearance when planted on lawns forming clumps distinct from any other plant. These clumps may consist

of from five to twenty plants each, according to the size of the grounds ; and when the roots are taken up, the spot may be re-turfed or filled with early-flowering bulbs.

The Dahlia is better calculated to ornament large grounds than to embellish small gardens, since its bold and brilliant corollas fit it for the former situation, whilst its great size and want of perfume are objections to its admission into the small garden ; and notwithstanding the vivid colours which these flowers present, and the high estimation they are now held in, we do not consider it a flower that is likely to hold a long reign in the realms of fashion.

The roots of these plants are used as an aliment by the Mexicans, but they are not yet become agreeable to European palates.

The name of Dahlia was bestowed on this plant in honour of Andrew Dahl, a Swedish botanist.

Only two species of these plants are yet known to us, and doubts are entertained whether these may be considered sufficiently distinct to be so divided, since they are separated by wavering marks. The *Frustranea*, or Barren-rayed, appears however to be a more slender plant, and has narrower foliage and smaller flowers than the *Superflua*, or Fertile-rayed Dahlia.

In examining the florets of the latter kind of

Dahlia, it will be seen that the filaments of the stamens are elastic, which, by extension, admit of the anther being protruded above the floret by the impulse of the stigmas from within; as, charged with pollen, they advance to their station through its five-valved membrane, which opposes their outlet at the summit, withdrawing the same to its place when these have passed. Thus, in flowers of the same class and order, we find novelty in the action of their minute parts that cannot fail to inspire the inspector with delight and admiration.

AFRICAN MARYGOLD. *Tagetes Erecta.*

FRENCH MARYGOLD. *Tagetes Patula.*

Natural Order *Composite Oppositifolia. Corymbiferæ,*
Juss. A Genus of the *Syngeneria Polygamia Su-*
perfusa Class.

As wands of divination downward draw,
And point to beds where sov'reign gold doth grow.
DRYDEN.

THE generic name of these Mexican flowers is said to have been derived from Tages, a grandson of Jupiter, who first taught the science of augury and divination, to the twelve nations of the Etrurians, who from hence became so celebrated for their pretended knowledge of omens and incantations. But as Tages could not have taught the use of plants peculiar to lands which the gods themselves had not visited, we think the name badly adapted, unless the Spaniards pretend that they were instructed through the arts of Tages to seek for the precious metal in fields covered with these golden flowers; and this will be as readily believed as that the species call French Marygolds became first stained and marked with a dark red

by the blood of the unhappy Mexicans whom the insatiable Spaniards slew in their own peaceful fields.

M. Pirolle tells us, and with a greater degree of probability, that these flowers were called *Tagetes*, from the Greek *tagé*, meaning principality, which shows the rank these plants held in the parterre.

The *Tagetes* appear to have been introduced into this country as long back as the year 1573, and we conclude that they were called French Marygolds from our having first received the seed from France. Gerard says, the African Marygold was first obtained "when Charles, the first Emperour of Rome, made a famous conquest of Tunis; whereupon it was called *Flos Africarus*, or *Flos Tunetensis*." But as these plants do not grow naturally in Africa, we may conclude that they were first received in Spain from South America about the time Charles returned from the coast of Africa; and in compliment to that monarch for having given liberty to twenty-two thousand Christian slaves, they were called African Mary-golds.

The French call the larger kind *Grand Œillet d'Inde*, Great Pink of India, and *Rose d'Inde*, Indian Rose; and *Tagetes Patula* they name *Petit Œillet d'Inde*, the Little Pink of India.

Thunberg, who visited Japan about the year 1775, for the purpose of making discoveries in botany, tells us that these plants are cultivated by those jealous and cautious islanders; and Loureiro notices that the Tagetes is also cultivated in China, Cochin-China, and many parts of India; but he remarks that it is not indigenous in those countries. Hernandez mentions it as a native of Mexico, in his history of that country; and the plants of the Tagetes, which flowered in the Eltham garden as long back as 1727, were raised from seeds sent direct from Mexico.

The students of botany will find these plants placed in the Second Order of the Nineteenth Class of Linnaeus's Sexual System, on account of the flowerets of the disk being bisexual, and those of the radius containing only female organs; whereas those of the Marygold, *Calendula*, stand in the fourth order of the same class, the flowerets of the disk in the latter containing only anthers, and those of the margin only stigmas. The Mexican flower also differs from the European Marygold in not closing its petals at night, a gift of nature so frequently noticed by our poets:—

The Mary-budde that shutteth with the light.

CHATTERTON.

The Marygold, that goes to bed with the sun,
And with him rises weeping.

SHAKSPEARE.

—— See the day is waxen olde,
And 'gins to shut in with the Marygold.

W. BROWN.

It is remarked by Linnaeus, that the Marygold usually opens its petals about nine in the morning, and closes them again at three in the afternoon ; but we observe that it depends more upon the state of the atmosphere than on the hour of the day.

Keats says—

Open afresh your round of starry folds,
Ye ardent Marigolds !
Dry up the moisture of your golden lids,
For great Apollo bids.

The African and French Marygolds usually begin to flower in July, and continue to give out a succession of blossoms until the branches are destroyed by frost ; on which account they are considered rather an autumnal than a summer flower. When judiciously planted, they add considerably to the gaiety of the parterre during the later months of the year, the tall African Marygold forming a brilliant background to clumps of China Aster, or displaying its golden corollas amongst the evergreens of the shrubbery ; whilst the more richly painted petals of the *Tagetes Patula*, or French Marygold, is well calculated to contrast with the blue or purple stars of the Aster, since no plant displays a richer colouring of carmine and gold.

The French Marygold sports considerably in varying its corolla, some being single, semi-double, quadruple, or full, as the Rose Centifolia; whilst Flora seems to have given the petals as many changes as can be wrought in two gay colours,—one flower displaying petals of a rich carmine, slightly edged with gold; others exhibiting yellow flowers, so fancifully striped or dashed with crimson, that it is difficult to find two plants with flowers alike.

These flowers have only their gaiety to recommend them, since their odour is more offensive than agreeable, and may be compared to those persons who depend more on their wardrobe than their conduct for making themselves agreeable: we therefore present them as emblematical of vulgar minds.

These showy annual flowers may be raised by sowing the seeds on a warm border in the open garden; but the more certain method of procuring fine plants is to sow the seed in the beginning of April upon a moderately hot bed, and when the plants are come up they should have sufficient air, to prevent their being drawn up weakly. When they are about three inches high they should be transplanted on a second bed, very moderately heated, covering them over with mats, to screen them from the sun and the winds, until they have acquired strength, observing to give them water in dry seasons. In

May they will be ready for removal into the parterre ; and in doing this they should be taken up with a ball of earth about the roots, so as to check the growth as little as possible. Should the earth be dry at this time, it would be desirable to water the bed about an hour before the young plants are removed, so as to make the soil adhere.

It is desirable to have a considerable number of these plants, as well as China Asters, in pots, as a reserve, to be plunged into any part of the grounds that may be deficient of autumnal flowers.

The seed of the *Tagetes* should be collected, not only from the finest plants, but from the centre flowers of the principal stems only. The varieties of the African Marygold are very subject to change ; so that unless the seeds are procured from the finest flowers, they are more apt to degenerate than the French Marygold ; and Miller recommends that the seed should have a change of soil every second year, so as to keep the varieties in perfection.

GOLDEN ROD. *Solidago.*

Natural Order *Compositæ Discoideæ*. *Corymbiferæ*, Juss. A Genus of the *Syngenesia Polygamia Superflua* Class.

In golden armour, glorious to behold.

Nor shines the silver moon one half so bright
Through the transparent bosom of the deep.

THE generic name of this plant is derived from *solidare*, *solidando vulnera*, or *in solidum ago*, “I consolidate,” from its supposed efficacy in healing wounds; and so highly did our ancestors esteem it for this and other medicinal properties, about the middle of the sixteenth century, that it ranked amongst the most expensive drugs. Gerard observes, at the end of that century, “It is extolled above all other herbes for the stopping of blood in sanguinolent vlcers and bleeding wounds, and hath in times past been had in greater estimation and regarde than in these daies; for, within my remembrance, I haue knowne the drie herbe which came from beyond the seas solde in Bucklersburie, in London, for halfe a crowne an ounce. But since (says the same author) it was founde in Hampstead

wood, euen as it were at our townes end, no man will giue halfe a crowne for an hundred weight of it; which plainly setteth foorth our inconstancie and sudden mutabilitie, esteeming no longer of any thing (how precious soever it be) than whilst it is strange and rare."

The use of this plant has been much commended by ancient medical writers, as a remedy against the disorders of the stone and gravel, &c.

A case is related in the Gentleman's Magazine, for February, 1788, of the efficacy of a decoction made with this plant in the stone. A boy, ten or eleven years of age, after taking a decoction or infusion of the Golden Rod for some months, voided great quantities of gravel, with many small stones, and after that fifteen larger stones, from three-fourths of an ounce to an ounce and a quarter, besides fifty or more not smaller than a large pea. It is frequently called Woundwort, from its vulnerary character.

It is not, however, used in modern practice, either in this country or on the continent; and we will therefore drop its generic title, and speak of it as the Golden Rod of the garden, which name it obtained from the colour of its diminutive and numerous flowers, which form spikes at the end of each spray of the plant. It is also called Aaron's

Rod. The Hortus Kewensis enumerates thirty different species of this plant, one of which is indigenous to England, one a native of Wales, and one has been found on the Pyrenees; the remainder all belong to North America.

The Canadian Golden Rod, *Solidago Canadensis*, was first introduced to our gardens in the year 1648; but as this species seldom exceeds more than two feet in height, it is not so much sought after as the taller kinds, which give a rustic gaiety to the shrubbery during the autumnal months, and is, therefore, well adapted as an ornament to cottage-gardens and rural grounds, where its spikes of multitudinous yellow flowers produce an agreeable effect interspersed with dark evergreens, or forming a background to banks of China Aster: it also contrasts well with the lilac colour of the Michaelmas Daisy.

These plants are increased by parting their roots, which should be done in the autumn, as soon as their flowers are past, or early in the spring, before they begin to send up shoots. It is one of the plants we recommend to ornament the banks of lakes and rivulets, where its pliant golden rods appear to great advantage when reflected in the water.

We do not find this plant noticed in the hiero-

glyphics of floral language, and have therefore placed it as the emblem of precaution, since nature seems to have guarded the nectar contained in these little flowrets by enveloping them in a silky down, by which they are shielded from the ravages of the bee.

MEADOW SAFFRON. *Colchicum Autumnale.*

Natural Order *Spathaceæ*. *Colthicaceæ*, Juss. A Genus of the *Hexandria Trigynia* Class.

SHAKSPEARE says, in his play of Cymbeline,

One that's sick o' th' gout, had rather
Groan so in perplexity, than be cured
By th' sure physician Death.

To such sufferers we therefore address our history of the singular plant which has been named Colchicum, from its growing so abundantly in the vicinity of Colchis, a city of Armenia, celebrated for its numerous poisonous plants, and as the birth-place of Medea.

It is thus noticed by Horace in the thirteenth ode of his second book,

Or temper'd every baleful juice
Which poisonous Colchian glebes produce.

Fabulous history informs us that this autumnal flower owes its origin to some drops being spilt, in the fields, of the magic liquor which Medea had prepared to restore the aged Æson to the bloom and vigour of youth ; and on this account the Colchicum was anciently regarded as a preservative against all sorts of maladies.

Could we divest the tales of antiquity of their fabulous dress, we should find them all explanatory of real events, and not the mere ideas of poetical imaginations: perhaps we should then discover that Medea having relieved Æson from a fit of the gout, his subjects celebrated her praise as having restored this monarch to youth and sprightliness. As Medea is sometimes called Colchis, we will surmise, for the consolation of our gouty friends, that it was the Colchicum that relieved Æson from his infirmities; and we will also hope that they may derive similar benefit through the aid of their medical friend, assisted by the virtues of this powerful plant. Most of our superstitious notions, however ridiculous they now appear, originated, in the first instance, from some reasonable opinion; and thus, because the Colchicum was a remedy against one complaint, credulity magnified its powers as a sovereign antidote. The Swiss peasants tie the flower of this plant around the necks of their children, with a firm belief that it will render them invulnerable to all diseases.

The Colchicum is thought to be the same root as the Hermodactylus of the ancient physicians, which, after having been entirely disregarded for many generations, is now again become an important article in the *Materia Medica*. It was for some time employed in the form of a concealed medicine

under the name of *Eau Medicinale*, which attracted great attention by its success in relieving the gout and rheumatic affections of the joints, but which has also frequently taken an injurious effect upon the constitutions of some persons : it appears, therefore, to be a medicine that should be only applied by the most cautious practitioners ; for the Colchicum is unquestionably a poisonous root, and its deleterious effects are to be dreaded until the precise dose is more accurately ascertained than it seems generally to be at this time. Mr. Waller observes, in his account of this plant, that one great cause of this difficulty is the extreme affectation of simplicity in the modern practice of pharmacy, and the dislike of practitioners for what they consider complicated prescriptions. It is, however, a fact, that vegetable juices brought in contact with each other do undergo a chemical change ; and a compound is produced very different to what might be expected from a mere mixture of the two. This fact has been long known to the wine and cider makers, who are well aware that there is a very considerable difference between the mixture of two different wines or ciders, and that which results from the mixture of two juices previous to fermentation. In the former case, the mixed liquor will partake of the properties of each ; but in the latter a distinct variety will be formed, in which neither can be recognised.

The specific gravity of the juices is also changed, which proves that a chemical action has taken place.

We would particularly recommend young medical students to make themselves acquainted with the nature of these chemical changes as it regards the properties of vegetables ; for, as the most powerful medicine becomes modified by being combined with other articles, whose action upon the body is different, the result of certain combinations cannot be even conjectured without previous experience. Every medical practitioner knows that the combination of opium and ipecacuanha produces a result widely different from either the narcotic properties of the one, or the emetic qualities of the other ; and we therefore trust that they will not let the fashionable rage for simplicity in medicine prevent their studying a preparation of Colchicum, that may be relied on for a more certain uniformity of action than any that has hitherto been discovered, and that may at the same time be more free from the disagreeable and dangerous effects which too frequently attend the *Eau Medicinale*.

The most eminent practitioners of modern times have acknowledged the extraordinary effects of the Colchicum in relieving that complicated form of disease called rheumatic gout ; but they have at the same time regretted the untractable nature of the

medicine, which is so uncertain in its effects. Mr. Waller is of opinion that much of this variety and uncertainty depends upon the season in which the roots are dug up; and he recommends the latter end of April or the beginning of May as the most desirable time.

By late experiments made on this plant, a peculiar, and hitherto unknown, alkali has been discovered, and in this its principal virtues is thought to reside, and this, we presume, acts upon the gout acid, if we may be allowed to give the disease that appellation, for modern experiments seem to demonstrate that the cause of gout in the system is a peculiar acid.

It now appears that the medicinal virtues of the Colchicum are not confined to the gout and the rheumatic affections of the joints only, as Mr. Haden has lately published a treatise on the properties of this root as a remedy against the most decidedly inflammatory cases, such as pleurisy, pneumonia, and other equally well-ascertained cases of increased action. This medical author considers the effect of the Colchicum to be the same as that which results from the employment of the lancet, or any other of the means commonly adopted for lessening increased action.

Mr. Haden generally recommends the root powdered, whilst Mr. Waller thinks the tincture to be

more uniform and certain in its effects ; and some physicians now give the preference to the flowers, and others to the seeds : so that every part of the plant seems possessed of powerful properties, and on this account all experiments should be left in the hands of able physicians. Dr. Störk of Vienna seems to have the credit of having restored this plant to the modern list of *Materia Medica*.

The poisonous properties of this plant seem known to all animals, as it were by instinct, since no cattle will touch it ; the very lambs fly at its aspect, and the young shepherdesses of the mountains become sorrowful when it appears amongst the grass, lest their playful flock should inadvertently swallow it. It is no uncommon thing to see these plants standing alone in pastures, where every other kind of herbage has been eaten down without a leaf of this plant being touched. The French give this plant the appalling name of *Tuer Chien*, Kill Dog, and *Mort au Chien*, which also signifies Dog's Death.

In floral language this flower expresses "My best days are past ;" for, far from inspiring us, like the Crocus, with joy and hope, it appears to announce to all nature the loss of the fine days, and the approach of a cheerless atmosphere. It appears naked like a sprite amongst flowers, to warn them of their destiny ; and nature seems to have reversed its order in some of the characters of this curious

plant, which cannot fail to interest, the students of natural history and botany ; and the closer they investigate the apparent phenomena of the Colchicum, the more will they be struck with the wonderful arrangements that the all-wise Creator has adapted in the formation of vegetables, which appear, on a superficial inspection, to act by contrarieties, whilst their actions are governed by the most consummate wisdom. Let us regard the Colchicum as a native of our moist pastures, and we shall find that its corolla is sent out of the earth with its parts of fructification at a season when they have only time to mature the anthers, that the stigmas may receive and convey the fecundating particles of vegetable nature to the numerous empty seed-shells that are prepared to receive it in the three-lobed capsule. As the season of the year would not allow the fruit of this late-flowering plant to ripen so as to multiply its kind, Providence has so contrived its structure, that it may be performed at a depth within the earth out of the reach of the usual effects of the frost ; and as seeds buried at such a depth are known not to vegetate, a no less admirable provision is made to raise them above the surface when they are perfect, and to sow them at a proper season. For this purpose the seed-vessels are lodged in the bosom of the embryo leaves, and are consequently thrust forth with the foliage about the

month of April. By the end of May they are generally ripe, and the leaves then wither and the root decays, having finished its duties not only by its oviparous nature, but by having at the same time given birth and nourishment to a new bulb in the earth by its viviparous powers. The new bulbs take their rise from the caudex at the base of the flower-tube, and are united by communicating vessels to the old bulb, from the juices of which the new bulbs extract their nutriment, until the parent-bulb decays, as is the case in the Tulip. The Colchicum has generally perfected its new bulb by the middle of May; and as no exhaustion has then taken place in forming either flowers or foliage, it is natural to suppose that the bulb must be then possessed of the most powerful medicinal properties.

It was formerly supposed that this plant produced its seed before its flowers, and for want of investigation this error gained general belief; but as a knowledge of botany became more generally known, the impossibility of such a circumstance was seen, and the natural history of the Colchicum was then developed.

The bulb sends up a flower in September similar in appearance to the Purple Crocus, excepting that it is quite destitute of foliage; and hence our peasantry name it the Naked Lady. The flower is monopetalous, the six deeply-divided segments

being united to the neck of the corolla, which forms a long tube reaching the bulb in which the seed-vessel is seated, and from whence the three long styles proceed through the neck of the corolla, carrying their stigmas to a sufficient height out of the ground to be matured and impregnated by the farina of the six anthers, which are also carried up to the air by being united to the corolla. When the necessary properties of the farina have been received by the stigmas, and conveyed to the seed-vessel by means of the long styles, the flower decays, and the fruit continues to grow until the spring, when it is sent out of the ground under the guard of the four leaves, which afterwards separate, and the seed soon becomes ripe. Thus this plant, reversing the accustomed order of the seasons, mingles its fruit with the flowers of the spring, and its flowers with the fruits of the autumn.

This poisonous plant is distinguished from the Autumnal Saffron Crocus, by having six anthers and three stigmas supported on three separate thread-like styles, whereas the Crocus has only three anthers, and one style bearing a divided stigma; both of these plants may be made ornamental to the parterre in the later months of the year.

The common Colchicum is indigenous to our moist meadows in many parts of the country, particularly in Essex and Suffolk. Gerard speaks of

it as being plentiful in his day in the neighbourhoods of Bath, Shepton Mallet, Northampton, and several other places.

For cultivation, the *Colchicum* bulbs should be taken out of the ground in May when the leaves are decayed, and they may be preserved out of the ground as Tulips and other flowering bulbs; but in the early part of August they should be committed to the earth at about three inches in depth, forming them into clumps wherever it may appear desirable to add dwarf flowers. They have the best effect when springing out of the turf, as the naked appearance of the flower is not then so conspicuous, and the purple or the white corollas shine to more advantage on the green sward than on the bare earth. There are several varieties of these flowers, some being perfectly white, others of a light or a dark purple, and some that have the petals striped with white and purple. These varieties are further increased by the flowers being doubled.

The Broad-leaved *Colchicum Byzantium* is a distinct species that grows naturally in the Levant, and which appears to have been first introduced into this country in the early part of the reign of King Charles the First.

The Chequer-flowered *Colchicum Variegatum* was also amongst the flowers that were cultivated in the parterre of the unfortunate Queen Henrietta

Maria, at her gardens at Edgecombe in Surrey. This latter species was originally brought from the Greek Isles; and as it is more tender than the other kinds it is generally treated as a green-house plant, and frequently blossoms as late as November, displaying its beautifully spotted corolla amongst the latest of Flora's gifts.

The common Meadow Saffron, *Colchicum Autumnale*, may be increased by seeds, and treated in the manner already directed for the raising of Hyacinths.

MICHAELMAS DAISY. *Aster Tradescanti.*

Natural Order *Compositi Radiati. Corymbiferæ*, Juss.
A Genus of the *Syngenesia Polygamia Superflua*
Class.

THIS North American Star-wort first assisted to illuminate the British parterre about the year 1623: it having been brought direct from Virginia by John Tradescant, jun., who visited the New World for the express purpose of collecting plants, his father having founded a garden of the first consequence in those days at Lambeth, and being also appointed gardener to King Charles the First. Mr. Tradescant collected the first considerable museum of Natural History ever formed in this country, and we find that it was much frequented by the people of fashion and consequence of his day. Botanists have named this species *Aster Tradescanti*, in compliment to his memory; but it has obtained the more familiar name of Michaelmas Daisy, from its flowering about that season of the year, and the corollas being radiated and nearly of the size of the common Daisy.

This rustic flower adds considerably to the embellishment of the autumnal garden, for its hardy nature suits it to every soil and situation, and when left undisturbed for a few years, it sends up such numerous branches that it bears more the appearance of a large shrub than a flowering herb: on this account it is admirably adapted to mix in plantations of evergreen shrubs, where its lilac flowers add as much gaiety in the months of October and November, as the early-flowering shrubs contribute towards the beautifying of the spring assemblage.

Of the utility of this American Aster we as yet know nothing further than that it affords the bees a late and almost a last resource; and we may conclude that these flowers contain a considerable quantity of honey, since we have frequently seen the corollas so thickly covered with these emblems of industry, that the flowers seemed to have wings attached to their petals. Thus the bees have their season for collecting of sweets considerably lengthened by the introduction of this and other plants of the Columbian fields; whilst we, by retaining the smiles of Flora on our parterres, lessen the dreariness of the winter months—for previous to the introduction of exotic plants, our floral season ended much earlier than at present: October and November now present us with a variety of gay flowers, formerly

All green was vanish'd, save of Pine and Yew,
That still display'd their melancholy hue;
Save the green Holly, with its berries red,
And the green Moss, that o'er the gravel spread.

The gloom of heavy masses of dark evergreens may be lessened by clumps of the Michaelmas Daisies; and they are not the less desirable from their requiring no further care than that of once planting them, and one large root may be divided into so many plants, that the expense of embellishing a large plantation with these flowers is not more than the price of a single root of some plants of less beauty, but later introduction.

The Common Michaelmas Daisy grows from three to five feet in height, and is therefore not calculated for the small flower-garden, excepting to form a shelter and background to more tender autumnal flowers. The dwarf variety of this plant produces smaller flowers, which are of a darker purple; this latter kind contrasts well with the Golden Rod, and may be planted amongst shrubs with a variegated foliage.

We present these flowers as the happy emblem of cheerfulness in old age, since like that blessing it contributes towards the enlivening of all who compose its circle.

WINTER CHERRY. *Physalis Alkekengi.*

Natural Order *Luridæ*. *Solanææ*, Juss. A Genus of the *Pentandria Monogynia* Class.

THE common Winter Cherry, which we occasionally meet with in some obscure part of our gardens, was formerly held in great repute for its medicinal properties, but in modern practice it is totally disregarded, and is only allowed the honour of associating with cultivated plants, from its producing an ornamental berry similar to the cherry in its appearance, and from whence the familiar name is derived. It is the *Φυσαλις*, *Physalis*, of Dioscorides, from *Φυσα*, a bladder, on account of the calyx being curiously inflated.

This exotic plant has been of long standing in our gardens ; the Kew Catalogue states as early as 1548, and Dr. Turner mentions it as being common in 1564. This author writes on it under the Arabian name of *Alkakinge*, from whence the specific title of *Alkekengi* ; he also calls it *Halicacabum vulgare*, and *Phissalis*. Pliny calls it *Halicacabum*, and *Vesicatorium*, in allusion to the bladder-shape of the calyx ; or as some old medical writers ima-

gined from its supposed virtues against the diseases of the bladder, for which purpose it was hghly extolled by the Arabian physicians.

The Winter Cherry appears to have been much more common in the time of Gerard than at present, as he observes, "The Redde Winter Cherrie groweth vpon olde broken wals, about the borders of fieldes, and in moist shadowie places, and in most gardens, where some conserue it for the beautie of the berries, and others for the great and woorthy vertues thereof."

This plant grows naturally in many parts of the South of Europe, Germany, China, and Cochin-China. The German peasants eat the berries by handfuls, and they are frequently brought to table in Spain and Switzerland ; they have an acidulous and not unpleasant taste, followed by a slight bitterness. They are esteemed detergent and aperient, but are principally recommended as a diuretic, which is thought to remove obstructions occasioned by gravel or mucus.

At present the berries are seldom used with us, excepting to mingle in bouquets of dried flowers to ornament the chimney-pieces of cottage parlours.

This species of *Physalis* is easily propagated by parting the roots after the stalks are decayed.

They thrive best in shady situations, but contribute little towards ornamenting the garden, until the berry is ripe in autumn, when it assumes all the beauty of the Cherry in gloss and colouring; and hence we make it the emblem of deception.

YELLOW AMARYLLIS. *Amaryllis Lutea.*

Natural Order *Lilia* or *Liliaceæ*. A Genus of the
Hexandria Monogynia Class.

Pride was not made for men ; a conscious sense
Of guilt, and folly, and their consequence,
Destroys the claim, and to beholders tells,
Here nothing but the shape of manhood dwells.

WALLER.

IN floral language the Amaryllis is made the emblem of pride, and the beauty of this splendid genus of plants makes the name of Amaryllis very appropriate, as it appears to be derived from the Greek *αμαρυγμα*, or *αμαρυν*, signifying splendour.

Monsieur Pirolle translates it *Je brille*, I shine, and perhaps we have no family of flowering plants more beautifully gay than that of the Amaryllis ; but unfortunately they all require a temperature a few degrees warmer than our natural climate, to enable them to flourish in the open parterre, excepting the Yellow Amaryllis, which is frequently called the Autumnal Narcissus, or the Star Lily, and which grows naturally in the South of France, Spain, Italy, and Thrace.

This species was brought to this country as long back as the time of Queen Elizabeth, as Gerard tells us he cultivated it in his garden ; yet it still continues rare in our parterres, although it is so desirable a flower to contrast with the Purple Colchicum, or Saffron Crocus of the autumn, as it usually continues in flower from the beginning of September to the middle of November, provided it is not planted under the drip of trees or shrubs. It loves an open situation, and thrives best in a fresh, light, and dry soil. The Yellow Autumnal Amaryllis is perfectly hardy, and increases very fast by its viviparous nature. The season for transplanting the offset bulbs is from the end of May to the end of July, but not later, as they then begin to send out new fibres, and to disturb them after this time will prevent their sending up flowers. We recommend that the bulbs should not be taken out of the ground oftener than once in four years, as they will be found to produce stronger and more numerous flowers. This is also one of the flowers that may be planted so as to spring out of the turf in many situations, and will give a good effect to banks that surround pieces of water.

Although we principally confine these volumes to the history of such hardy plants as will flourish in the open garden, we cannot pass over this splendid genus of flowers without recommending all the

more hardy kinds, which only require the assistance of a frame, to be planted in pots, in order that they may be sunk in the earth when in blossom, or that their pride may be displayed amongst the clumps of green-house plants that are set out of doors during the summer months.

For this purpose we mention the Atamasco, the Jacobea, and Belladonna Lily, as well as the Wave-flowered Amaryllis, *undulata*.

**BEARDED CREPIS, OR PURPLE-EYED
SUCCORY-HAWKWEED. *Crepis Barbata.***

Natural Order *Compositæ Semiflosculosæ*. *Chichoraceæ*,
Juss. A Genus of the *Syngenesia Polygamia Æqualis* Class.

THIS annual plant, whose flowers so familiarly spangle our parterres with their purple eyes and yellow petals, from the month of July to the end of autumn, grows spontaneously as a weed about Montpelier in France, also in Spain, Italy, Sicily, and other southern parts of Europe.

It appears to have been first introduced to this country by Mr. William Boel, in the year 1620; and it is of so hardy a nature that the finest plants are generally those which spring from self-scattered seed, although the usual time of sowing the seed is not before the spring.

The generic name of this plant is thought to be derived from *Kρητις*, the Greek name for sandal, and probably was so given it by the ancients on account of the linear leaves which surround the flower-bud, like the thongs of a sandal.

We have given it the specific title of Bearded-

Crepis from the same cause, and the French also call it *Crépide Barbue*.

In emblematical language we present it as the symbol of protection, because the flower-buds are protected by the linear leaves that form the beard.

RUDBECKIA. *Rudbeckia.*

Natural Order *Compositæ Oppositifoliae.* *Corymbiferæ*, Juss. A Genus of the *Syngenesia Polygamia Frustranea* Class.

THIS genera of plants, of which we have nine species, are all indigenous to North America; but Miller tells us that he received seeds of one of the species from Siberia, as well as from North America: and this justifies what we have frequently noticed in regard to plants, that some of the genera are generally to be found in the same latitude of the Old World, excepting in instances where the altitude of situation differs materially.

This family of plants was named Rudbeckia, in honour of Olaus Rudbeck, a Swedish physician, who founded the botanical garden of Upsal. His son succeeded him as professor of botany and anatomy, and afterwards joined Berzelius in founding the Swedish academy. The father died in 1702, and the son in 1740; and as Linnæus gave his first lectures on botany in 1730, when

he was only in his twenty-fourth year, it is more than probable that this great man received a taste for the science of botany from the foundation that had been previously laid by his worthy countrymen, after whom this plant is now called in every part of the world, where the European languages are known. We have therefore placed it as the emblem of justice in the Dictionary of Floral Symbols.

These flowers are placed in the third order of the nineteenth class of the sexual system, because the florets of the disk are bisexual, and those of the margin neuter, which is conspicuous in the *Rudbeckia Purpurea*. This species is a native of Carolina and Virginia, from whence it was introduced by the Rev. John Banister previous to the year 1699; and although it is indigenous to warmer climes, it flourishes in the open parterres of the British gardens. It rarely, however, ripens its seed with us, and is therefore propagated by parting the roots either in the autumn or in the month of March; it loves an open exposure, and a light free earth. The petals of this flower are of a singular shape, being pendulous and curling inwards, having the appearance of so many pieces of narrow ribbon notched at the end; the colour is nearer to a light crimson than to purple. This

is the second flower which Curtis figured in his Botanical Magazine. The Rudbeckia Pinnata, which is a fragrant species, was introduced in 1803, and may be seen figured in the Exotic Botany, plate thirty-eight. These plants are in flower from August to October.

CHINESE CHRYSANTHEMUM. *Chrysanthemum Indicum.*

Natural Order *Compositæ* *Dioscoideæ*. *Corymbiferæ*, Juss. A Genus of the *Syngenesia Polygamia Superflua* Class.

SINCE the Flora of China has poured her autumnal gifts so abundantly over our parterres, the winter of our gardens is considerably shortened; and of all the flowering plants which that fertile country has afforded us, none has so much contributed towards enlivening the dreary months as this favourite flower of the Mandarins.

In the Chinese language the generic term of this plant is *Kuk fa* or *Kok fa*, and those of the largest flowers are distinguished by the name of *So ee kok*, and the white varieties generally are called *Yok qui lung kok fa*. We have given below as many of the Chinese names of the varieties as we have been able to collect, and which are

expressive of some circumstance in the flower or plant *.

These singular people have ever been celebrated for their love of floriculture, and it is said that they cultivate as many as fifty varieties of this species of Chrysanthemum, many of which we see pictured in the representations of their saloons and trellised virandas ; and, as they are usually painted as growing in ornamental vases, we naturally conclude that the Chinese hold this flower in high estimation. It is also cultivated with no less care through the whole empire of Japan ; and the

* *Chrysanthemum Indicum.*
White velvet do.

White silver-needle do.
Yellow do.
Shining yellow do.
Golden-fringed do.
Golden-feathered do.
Horse's ear yellow do.
Tiger's claw do.
New tiger's claw do.
Dark brown do.
Tall dark brown do.
Carnation do.
Cochineal do.
Shining red do.
Red embroidered do.
Tall strong-scented do.
Imperial do.

Pak tsen yong kok fa : this is agreeable to the pronunciation of Canton, but in the dialect of Pekin we understand the final *k* is softened in *i*.

Ngun chun pak kok fa.
Wong tot too kok fa.
Yung shan wong, k. f.
Kum peen, k. f.
Kum fung mow, k. f.
Ma yee wong, k. f.
Fu chow wong, k. f.
Sin too chin, k. f.
Tsoo king, k. f.
Tsoo fung kow, k. f.
Ngow sik heen, k. f.
Nga law, k. f.
Yung shan hong, k. f.
Hong sou has, k. f.
Chun hoang kow, k. f.
Yu ee wong, k. f.

beauty of these flowers is frequently displayed on the lacquered ware for which they are so eminent.

The name of Chrysanthemum is derived from the Greek $\chiρυστός$, gold, and $\άνθος$, a flower, which was given to this genera of plants, because the species most familiar to the Greeks produces flowers of a gold colour. This shows the error of forming the generic name of plants from the colour, since in one species of Chrysanthemum we have all the colours of the rainbow ; and thus the white, the pink, the lilac, the purple, and the yellow, are all indiscriminately styled golden flowers.

The Indian or Chinese Chrysanthemum was introduced into this country as long back as the year 1764, Miller having received it from Nimpu, and cultivated it in the botanic garden at Chelsea, where it was probably lost through some accident, as it is not mentioned in the first edition of the *Hortus Kewensis*.

It was a second time introduced into Europe by Monsieur Blanchard, a merchant of Marseilles, who brought the well-known purple variety from China to France in 1789, from whence it reached England in 1795, and being then considered a new plant, it was sold at a high price by the nursery-men in the neighbourhood of our metropolis, until its easy propagation became known. It is only within these last few years that its cultivation

has attracted the notice of florists in general, who now amply compensate for their former neglect by present industry in procuring varieties, and skill in growing them, which is such as promises to rival even the Chinese themselves. We already possess about thirty varieties of this ornamental plant, and we may calculate that in a few years from this time we shall obtain all the kinds known in China and Japan. Like the roses of China, the Chrysanthemums soon escaped from the confinement of the conservatories of the curious, and as rapidly spread themselves over every part of the island, filling the casements of the cottagers, and the parterres of the opulent with their autumnal beauties, that now vie with the Asters of their native land in splendour and variety of colour.

These beautiful vivacious plants have their branches clothed with a foliage deeply cut, which is covered with a vegetable wool or flock-like substance. The general colour is of an ashy green, similar to that of the foliage of the artichoke, although the shades differ considerably in the varieties, some being much lighter than others: on the whole, we should pronounce the most frequent colour to be a pale dull green, although when planted in the open garden the hue becomes of a more cheerful tint, particularly in the spring, when it assumes a yellower cast. The varieties differ in

the shape of their leaves, some having their serratures much deeper cut than others, whilst the ends of the serratures are sharp and pointed, and in other kinds bluntly rounded. In some of the varieties the foliage is strongly aromatic; in others, slightly so, or quite scentless: the flowers vary equally in this respect, the old Purple or Ruby-coloured Chrysanthemum being strongly and agreeably aromatic. Some of the kinds have a perfume similar to that of honey, but the odour of the greater number is like that of the Chamomile flower.

Nature, as if not satisfied in diversifying the colours of these flowers, has also varied the formation of the florets, by which the changes are considerably augmented, and the varieties so perfectly distinct, that the quilled flowers have not at all the same character and appearance as those with florets half tubular and half ligulate; whilst others, that expand with petals perfectly ligulate or flat, bear a resemblance to the shape of a China Aster; and others, with tubular florets in the centre, and rays of plain ones in the circumference, give the seducing form of a beautiful Ranunculus. Some of the kinds have their florets so disposed in the calyx as to form a kind of tassel when half expanded; and when fully open they remind us of a French powder-puff, such as was used by the beaux of the last century.

The principal varieties of the White Chrysanthemum are the silver white, the changeable white, the quilled white, the tasseled white, and the superb white. In yellows we have the sulphur colour, the golden yellow, the buff, the orange, the flame yellow, the copper colour, and the Spanish brown ; these also vary in the formation of their florets. The same varieties take place in the lilac colour ; and in reds we have them from a pale rose to a rich crimson : but in the darker dyes we have only seen the old purple, ruby, or claret colour. A rich blue would be a most desirable variety, and we recommend cuttings of the lilac kinds to be planted in a soil with a considerable portion of bog or heath earth, with a hope that it may effect such a change.

The Chinese Chrysanthemum may now be considered a hardy perennial plant, since it stands the severity of our winters in the open garden, unless it be planted in a wet and cold soil. We shall therefore first notice it as a contributor to the beauties of the parterre, and recommend it to be planted in ample quantities to give effect to the pleasure-gardens when Flora has withdrawn most of her other embellishments. For this purpose it should be planted in those parts of the grounds that are sheltered from the north by shrubs, trees, or buildings, so as to protect the flowers from the effects of the cutting winds, and it is also desirable

that a similar shelter should be given against the south-west winds. As the winds are less frequent from the eastern point at the season when the Chrysanthemum flowers, we have found them retain their beauty longest in spots that have been open to the south or south-east aspect, although in mild autumns these plants will flourish in almost any situation, nor are they particular as to soil, excepting it be too wet; but they thrive best in a light free earth, and are observed to preserve the colours well in such soil. To increase the size of the flowers, the earth should be mixed with about a third part of rotten dung that has been taken from a melon or cucumber bed; and if a top dressing of the same rich manure be given to the plants when the flower-buds appear, it will greatly contribute towards enlarging the corollas, particularly if rain or watering follow.

The Chrysanthemum sends out a great quantity of fibrous roots, in order to supply the numerous flowering stems with nourishment—consequently the earth within its reach soon becomes exhausted: therefore the plants should not be suffered to flower more than two years without being removed to other spots, or having the soil changed, as without this precaution the blossoms will become small and poor; and rather than suffer the plants to become too large, it is best to separate them every year,

planting several so near to each other that they may appear like one clump, without being so crowded as to affect the roots in their research for nourishment. The mixing of the different varieties of colours on one spot is objectionable, since it gives the effect of some of the flowers being faded ; therefore, when the clumps are not separated at some considerable distance from each other, the colours should be divided by plants of the white varieties, but the larger the masses of each separate colour are, the better will be the general effect. But to have these plants in the height of their floral beauties they should be cultivated in pots, which gives the advantage of our placing them in the open garden in favourable weather, or dispersing them amongst the plants in the conservatory in blusterous seasons. The Chrysanthemum is also well calculated to decorate halls and such parts of the house where more delicate plants would not stand in flower ; and when so sheltered it may frequently be kept in blossom until Christmas :— for this purpose we recommend large plants that send up several tall stems, and appear like flowering shrubs ; these necessarily require pots of a proportionable size, and rather broad than deep.

Those who wish to excel in the size of the flowers, cannot do better than follow the plan which the Chinese adopt in their mode of cultivating this charming flower.

During the early part of May they take cuttings of the plants about five inches in length, which they plant in a shady situation, covering them with a hand-glass until they have taken root, when air is admitted to strengthen the plants; and as soon as they are well rooted they are planted separately into small pots, and the pots plunged into a border of earth in an open situation: here they require frequent watering unless the weather is showery. About the end of August or the beginning of September, the plants are shifted into larger pots, and a rich mould given them. They are continued in the open air, but not plunged in the earth, and have frequent nourishment given them by means of a rich liquid manure, such as may be taken from the drainage of a sewer, stable, or cow-house, mixed soap-suds, and similar matters; and when the frost or bad weather comes on, the pots are removed into the house, and placed where they have light and free air, thinning the flower-buds occasionally, in order to ensure large blossoms. This mode of cultivating the Chinese Chrysanthemum has been followed for several years with the greatest success by Mr. Joseph Wells, gardener to William Wells, Esq., of Redleaf, near Tonbridge.

Mr. Wells says, "the plants, when treated in this manner, are very different in their appearance from the Chinese Chrysanthemums, as usually

grown : they have no shoots from the roots, which allows the strength of the plants to go to the blossoms ; a single stem rises from the pot, and at the height of four or five inches branches off into two, three, or more flowering stems, from one to two feet long, terminated by large flowers, and covered in their whole length by vigorous foliage."

The Count de Vaude has had these plants cultivated in the highest perfection at his garden at Bayswater, where they have always been flowered in pots No. 38, which size seems best suited to the Chinese manner of growing them. Mr. Loudon says, in his *Encyclopaedia of Gardening*, "The true mode of displaying the beauties of this charming flower is to keep it in pots, and train only one or three stems erect, and branching regularly on all sides. All suckers should be removed, and the side branches, and top or head so arranged and adjusted by a nice application of black thread or wires, attached to the main prop, as to render the figure of the entire plant perfectly symmetrical. If three stems are not trained, one is better than three, because it grows stronger; but three are better than two, which do not compose a whole; and better than a greater number than three, because, unity departed from, there is no limit to irregularity. One and three are unity; because one is complete, and three has a beginning, middle, and

end. All possible numbers besides, either fall short of or exceed unity; they are therefore irregularities, and irregularities are redundant, infinite, and unsatisfactory to contemplate, unless there appears a sufficient reason for departing from unity."

In cultivating the Chrysanthemums for the house, I have found it desirable to grow some of the strongest plants in large pots, so as to procure them of the greatest height and size possible, at the same time pruning off all superfluous shoots: by this means I procured plants resembling large flowering shrubs, which proved a great ornament by the mass of flowers, when either standing in the house, or when placed occasionally amongst the shrubs of the open garden. This mode may be objected to on account of its frequently causing the lower part of the branches to become bare of foliage; but this deficiency is not seen when the pots are placed behind dwarf evergreens; and when they are placed on a lawn, or in either the saloon or conservatory, the large pots containing the tall plants should be surrounded by the more dwarf plants, and thus a conical mass of flowers will be given that cannot be so happily obtained by any other means. I should therefore particularly recommend, that some of the tallest-growing varieties should always be planted in suitable-sized pots,

so as to procure the largest plants possible, at the same time not neglecting the modes recommended both by Mr. Wells and Mr. Loudon, as this will give the means of decorating small apartments during the winter months; or, if required, produce an unusual floral effect in the conservatory or festive galleries.

We do not find that the Chrysanthemum has been figured in the emblems of floral language, and we therefore present it as the symbol of cheerfulness under adversity; a blessing which but few persons possess, yet it is as desirable as it is to find plants that reserve their beauties to enliven the months so adverse to the reign of Flora.

With a hope of being allowed to meet our friends again, we close the Flora Historica with the lines of Waller :—

Fade, flowers! fade; nature will have it so;
'Tis but what we must in our autumn do!
And as your leaves lie quiet on the ground,
The loss alone by those that loved them found,
So in the grave shall we as quiet lie,
Mias'd by some few that loved our company:
But some so like to thorns and nettles live,
That none for them can, when they perish, grieve.

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